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NEW DELHI, SATURDAY, FEBRUARY 16, 1985 (MAGHA 27, 1906)

इस भाग में भिम्न पृष्ठ संख्या दी जाती है, जिससे कि यह असग संकलन के रूप में रखा जा सके।
(Separate paging is given to this Part in order that it may be filed as a separate compilation)

# भाग III—खण्ड 2

[PART III—SECTION 2]

पेटेन्ट कार्यालय द्वारा जारी की गई पेटेन्टों और डिजाइनों से सम्बन्धित अधिसूचनाएं और नोटिस (Notifications and Notices issued by the Patent Office relating to Patents and Designs)

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Calcutta, the 16th February 1985

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# THE PATENT OFFICE

# 214, ACHARYA JAGADISH BOSF ROAD, CALCUTTA-700 017

# **CORRIGENDUM**

In the Gazette of India, Part-III, Section 2, dated the 20th October, 1984 Pages 888, Column 1, under the heading "PATENTS SEAI ED" in 8th line for number 14692 read 146923.

# APPLICATION FOR PATENT FILED AT THE HEAD OFFICE, 214, ACHARYA JAGADISH BOSE ROAD, CALCUTTA-17

The dates shown in crescent brackets are the dates claimed under Section 135, of the Act.

# 10th January, 1985

- 15/Cal/85. Mukulesh Mitra. Improvements in or relating to waffle membraned ribbed panel precast concrete sanitary latrines and low cost houses.
- 16/Cal/85. Vsesojunznv Nauchno-Issledovatelsky I Proektny Institut Aljuminievoi. Magnievoi I Elektrodnoi Promyshlennosti. Apparatus for heat treatment of powdcred materials.
- 17/Cel/85. Hocichst Aktiengesellschaft. Process for the preparation of anionic surface active compounds based on oxyalkyl ated naphthol novolacs. [Divisional date 5th February, 1982].

# 11th January, 1985

- 18/Cal/85. Harmstore AG. Driving arrangement for watercraft.
- 19/Cal/85. Projects & Development India Limited. Improved low energy synthesis loop using two stage conversion in two radial converters and two stage separation process.
- 20/Cal/85. Bernd Jung. Lifting unit for persons and/or loads.

# 14th January, 1985

- 21/Cal/85. NL Industries, Inc. Process for preparing high quality titanium dioxide.
- 22/Cal/85. Etat Francais. Improvements in supercharged internal combustion engines having a bypass conduit and an auxiliary combustion chambers which are provided with a regulating system.
- 23/Cal/85. Spetslalnoe Konstruktorsko-Tekhnologicheskoe Bjuro Katalizatorov 9 opytnym Proizvodstvom. Apparatus for thermal treatment of a loose material.

# 15th January, 1985

- 24/Cal/85. Axel Johnson Engineering AB. Plate pack for a lamella separator.
- 25/Cal/85. Westinghouse Flectric Corporation. Ganged circuit breaker arrangement.
- 26 /Cal /85 Vsesoiuzny Nauchno-Issledovatelsky Proektno
  Konstruktorsky I tekhnologichesky Institut
  Vzryvoza-Schischennogo I Rudinchnogo Elektrooborudovania. Microswitch.
- 27/Cal/85. (1) Grigory Dmitrievich Sukeoverkhov, (2) Jurv Alexandrovich Yakovlev, (3) Sergei Ivanovich Sumachev. (4) Boris Nikolaevich Khorkin, (5) Valery Vladimirovich Arkhipov, (6) Rady Petrovich Papkovsky. Loading Ramp.
- 28/Cal/85. (1) Georgy Mikhailovich Kochkin, 2. Alexander Fedorovich Pichakhchi, (3) Sergei Petrovich Salomatin. Filter Press.

# APPLICATION FOR PATENTS FILED AT THE PATENT OFFICE BRANCH, MUNICIPAL MARKET BUILDING, 3RD FLOOP KAROL BAGH, NEW DELHI-5

# 26th December, 1984

- 958/Del/84. Council of Scientific and Industrial Research.
  "A process for preparation of hypochol sterolemic/hypolipidemic active extract of ritizomes of curcuma species of plant materials".
- 959/Del/84. Council of Scientific and Industrial Research.

  "An improved process for the recovery of metallic copper from copper converter slag or any other oxidised bearing material".
- 960/Del/84. Council of Scientific and Industrial Research,
  "A process for the preparation of 2-arylaliphatic acids".
- 961/Del/84. Council of Scientific and Industrial Research.
  "An improved process for electrolytic production of lead".

# 27th December, 1984

- 962/Del/84 Mineral Deposits Limited, "Spiral separator". [(Convention date January 9, 1984) (U.K.).]
- 963/Del/84. NRM Corporation, "Tire building machine and method".
- 964/Del/84. Standard Oil Company, "Amorphous carbon electrodes and their use in electrochemical cells".
- 965/Del/84. Pfizer Inc., "Laminate device for controlled and prolonged release of substances to an ambient environment.

# 28th December, 1984

- 966/Del/84. Toyo Engineering Corporation, "Reactor".
- 967/Del/84. Boliden Aktiebolag, "A method for recovering the metal values from materials containing tin and/or zinc".
- 968/Del/84. Imperial | Chemical Industries PLC, "A basecoat composition". [Convention date April 14, 1980) (U.K.).] | [Divisional date March 30, 1981].

# 29th December, 1984

969/Del/84. Vam Organic Chemicals Limited. "A process for the preparation of chloro acetaldehyde diethyl acetal".

# 31st December, 1984

- 970/Del/84. Alsthom Atlantique, "Process and device for draining piles of wetted granular material".
- 971/Del/84. The Parker Pen Company, "Microlaminated coating".
- 972/Del/84. Endre Palfiv. "Method of procedure for construction of drilled well principally water producing well and well outfit for carry out the procedure".
- 973/Del/84. Boliden Aktiebolag, "A method for producing metallic lead by direct lead smelting".
- APPLICATIONS FOR PATENTS FILED IN THE PATENT OFFICE, POMBAY BRANCH AT TODI ESTATES, 3RD FLOOR, SUN MILLI COMPOUND, LOWER PAREL (WEST), BOMBAY-400 013

# 20th December, 1984

- 347/Rom/84 Dynamic Enterprises. A Deburring Tool
- 348/Bom/84. Dynamic Fnterprises. A trolley and its coupling arrangement for two wheeler vehicles.
- 349/Bom/84 S. M.-Rafik, A Hack-Saw Blade Holder Frame.
- 350/Bom/84. B. B. Vishwakarma & R. Vishwakarma. Coal Burning Domestic Chulha.
- 251/Bom/84. K. R. Dholaria A speedometer cum safety device for diesel engines.
- 352/Bom '84 Hindustan Lever Ltd. Process for preparing a transition metal-silicate catalyst.
- 353/Pom/84. Maneklal Scientific Research Foundation. A novel delivery system for chemical water treatment.

# 22nd December, 1984

- 354/Bom/84. Anip Faucets Pvt. Ltd. Hot or Cold Basin Cock.
- 355/Bom/84. J. H. Varia, N. P. Mehta, K. K. Varia & N. P. Mehta. Tooth pick-cum-dental floss.
- 356/Bom/84. Hindustan Lever Ltd. Improvement in or relating to process for the preparation of acetulindans.

# 26th December, 1984

357/Bom/84 Romesh Chandra Dutt. Apparatus for improving the efficiency of internal combustion engines.

# 27th December, 1984

358/Bom/84. Rajeshwari Chandramouli. A private subscriber Tele-communication equipment.

# 28th December 1984

359/Bom/84. Puran Ratilal Mehta. An improved insulator.

360/Bom/84. Puran Ratilal Mehta. A strain hardware fitting system using the improved insulator for termination of 11 KV power transmission lines.

# 29th December 1984

361/Bom/84. Ravi Kuchīmanchi, M. N. Thakur. An improvement in the cube shaped puzzle.

362/Bom/84. Neela Vinayak Rashinkar. An improved roll type huller.

# 31st December 1984

363/Bom/84. B. K. Nevatia. Improved process of making citrus fruit juice containing pulp.

APPLICATIONS FOR PATENTS FILED AT THE PATENT OFFICE BRANCH, 61, WALLAJAH ROAD, MADRAS-600 002

# 31st December, 1984

- 1059/Mas/84. Indian Space Research Organisation. An electro-optical instrument to measure agronomical parameters.
- 1060/Mas/84. Dana Corporation. Clutch with a piloted and spring loaded driven disc hub.
- 1061/Mas/84. Pilkington Brothers P.L.C. Apparatus for making fibre-reinforced cement sheet material. (January 5, 1984; united Kingdom).
- 1062/Mas/84. Minnesota Mining and Manufacturing Company. Directionally imaged sheets. (January 17, 1984; Canada).

# 1st January, 1985

- 1/Mas/85. R. Devaraj. A device for climbing a palm tree.
- 2/Mas/85. R. Devaraj. An automatic welding shield.
- 3/Mas/85. R. Devaraj. A chin-operable welding shield.
- 4/Mas/85. Sinclair Research Limited. Key mechanism for a keyboard. (January 12, 1984; United Kingdom).
- 5/Mas/85. Sinclair Research Limited. A digital computer. (January 12, 1984; United Kingdom).
- 6/Mas/85. Kabushiki Kaisha Kobe Seiko Sho. Method for reforming hydrocarbons.

# 2nd January, 1985

- 7/Mas/85. Linde Aktiengesellschaft. Process for producing synthesis gas.
- 8/Mas/85. Linde Aktiengesellschaft. Process for the combined production of ammonia and urea.
- 9/Mas/85. Linde Aktiengesellschaft. Process for the separation and simultaneous obtaining of acid impurities from gas mixtures.

# 3rd January, 1985

10/Mas/85. Carbonnages De France. Coal gasification improved process for tailings gasification.

# 4th January, 1985

- 11/Mas/85. U. V. Nayak. A device to plaster surface/s of solid bodies such as wall, floor, roof.
- 12/Mas/85. Insituform Holdings Limited. Improvements relating to the lining of pipelines and passageways. (January 5, 1984; United Kingdom).
- 13/Mas/85. Union Carbide Corporation. Separation of aromatic and nonaromatic components in mixed hydrographon feeds.

# ALTERATION OF DATE

155583. Ante dated to 10th May, 1979. (1042/Cal/82)

155584. Ante dated to 10th May, 1979. (1043/Cal/82)

155585. Ante dated to 10th May. 1979. (1451/Cal/82)

155586. Ante dated to 25th January, 1977. (513/Del/80)

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# CLASS 65B<sub>3</sub>

155520

Int. Cl.: H 01 f 21/00.

TAP CHANGES EQUIPMENT FOR THREE-PHASE REGULATING TRANSFORMERS.

Applicants: MASCHINENFABRIK REINHAUSEN GEBRUDER SCHEUEECK GMBH & CO KG., OF 8, FALKENSTEINSTRASSE, 8400 REGENSBURG 12, GERMAN FFDERAL REPUBLIC.

Application No. 2027/Cal/75 filed on 20th October 1975. Inventor: KARL STENZEL.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 7 Claims

A tap changing equipment for three-phase regulating transformers, comprising a respective rotary load diverter switch and a respective rotary tap selector switch for each of the three phases, wherein the load diverter switches of the first

and second phases and the tap selector switch of the first phase are arranged in a first sub-assembly co-axially with a first drive shaft to drive the switches of the first sub-assembly, the load diverter switch of the third phase and tap selector switches of the second and third phases are arranged in a second sub-assembly co-axially with a second drive shaft to drive the switches of the second sub-assembly co-axially with a second drive shaft to drive the switches of second sub-assembly, and the first and second drive shafts are each connectable at one axial end of the respective sub-assembly to a common drive mechanism.

Compl. speen. 7 pages.

Drg. 1 sheet.

CLASS: 40 F

155521

Int. Cl.: B 03 c 3/00.

An electrostatic wet precipitator for extracting solid or semi-solid particles, besides toxic components, from air or contaminated gaseous media.

Applicants: DART INDUSTRIES, INC., OF 8480 BEVERLY BOULEVARD, LOS ANGELES, CALIFORNIA, UNITED STATES OF AMERICA.

Inventor: MARY Elizabeth BOURNE.

Application No. 2062/Cal/75 filed October 27, 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

### 3 Claims

An electrostatic wet precipitator provided with concentrically-arranged collector tubes defining at least one vertically-disposed annular gas passage, means to produce downwardly-flowing films of liquid on the complementary surfaces of the collector tubes which line each gas passage thereby to form liquid collectors, and a discharge-electrode structure disposed within each gas passage in spaced relation to said liquid collectors, a high voltage being applied between the discharge-electrode structure and the liquid collectors to ionize the contaminants in the gaseous stream flowing through the gas passage to cause migration of contaminants toward the liquid collectors and thereby purify the gas before it is discharged from the upper end of the passage, characterized by inlet means including a venturi-opening to feed the contaminated gaseous stream to be purified into the lower end of each passage to produce an expanding gas which, flows upwardly through the passage in counter-current relationshipto the liquid films to force said liquid films against the surfaces of the collector tubes to maintain the uniformity thereof and to prevent the liquid from entering the gas passage and interfering with the migration of contaminants.

Compl. specn. 18 pages.

Drg. 3 shheets.

CLASS: 104 P, 127C

155522

Int. Cl. : C 08 d 13/00; F 16 g 1/28.

METHOD OF MAKING A NOTCHED TRANSMISSION RELT.

Applicants: UNIROYAL, INC., AT 1230 AVENUE OF THE AMERICAS, NEW YORK, NEW YORK 10020, IN THE COUNTY AND STATE OF NEW YORK, UNITED STATES OF AMERICA.

Inventor · PETER HENRY BATCHELAR.

Application No. 2071/Cal/75 filed on 28th October 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 6 Claims

A method of making a notched transmission belt, characterized by placing arond a mold having a smooth cylindrical surface component layers of a transmission belt including at least one layer of elastomeric material; disposing arond the mold and layers thereon an endless elastomeric aleeve

having an inner surface with ribs fromed thereon; laterally expanding said endless elastomeric sleeve while disposing said sleeve arond the mold and layers thereon; and urging said said sleeve against said layers on said mold under heat and pressure to form a cured belt slab having an outer surface having molded grooves therein.

Compl. specn. 10 pages.

Drg. 3 sheets.

CLASS: 172C.

155523

Int. Cl.: D 01 g 13/00.

IMPROVEMENTS IN OR RELATING TO A DISCONTINUOUS SPINNING PROCESS AND AN APPARATUS FOR CARRYING OUT THE SAME.

Applicants: WM. R. STEWART & SONS (HACKLE-MAKERS) LIMITED, OF MARINE PARADE, DUNDEE, SCOTLAND.

Inventors: WILLIAM RENNIE STEWART AND DAVID BRUCE STEWART.

Application No. 2073/Cal/75 filed on 28th October 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 9 Claims

A discontinuous spinning process for spinning fibre belends which comprises the steps of forming a sliver of the dissimilar fibres, separating the fibres at the point of dispersal of the sliver, and reassembling the separated fibres into a yarn, characterised in that the step of separating the fibres is carried out by contacting the sliver with the moving peripheral surface of a beater drum, the peripheral surface of the said drum having needle pointed pins disposed thereover.

Compl. specn. 8 pages.

Drg. 11 sheets.

CLASS: 160C

155524

Int. Cl.: B 61 g 5/00.

COUPLING DEVICE FOR PNEUMATIC BRAKE LINES OF VEHICLES.

Applicant and Inventor: JACK PECHE, OF 116, 10TH STREET, PARKMORE SADTON, JOHANNESHBURG, TRANSVAAL, REPUBLIC OF SOUTH AFRICA, AND ACHILLE GEORGE RICHMAN, OF 32, STOCKLEIGH HALL, PRINCE ALBERT ROAD, LONDON NW8 7 IB, ENGLAND.

Application No. 2087/Cal/75 filed on 29th October 1975.

Appropriate office for apposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 11 Claims

Apparatus for coupling pneumatic brake lines of vehicles includes an axially and resiliently compressible tubular projection attachable to a vehicle to extend outwardly parallel to the vehicle draught axis, a valve for controlling flow of air between the brake line of the vehicle and the bore of the projection which valve is so biased that it is closed when the projection has been axially compressed to a predetermined extent and a head at the free end of the projection formed to align and connect substantially airtightly with a similarly formed head of a projection of like apparatus attached to an adjacent vehicle when the draw-gear of the vehicles is coupled, which coupling compresses the projection to the predetermined extent.

Compl. specn. 19 pages.

Drg. 4 sheets.

CLASS: 37A

155525

Int. CI.: B 01 d 23/00.

CONTINUOUSLY WORKING CENTRIFUGE.

Applicants: BRAUNSCHWEIGISCHE MASCHINEN-BAUANSTALT, OF AM ALTEN BAHNHOF 5, 33 BRAUNSCHWEIG, FEDERAL REPUBLIC OF GER-MANY.

Inventors: PETER NATT AND HEINRICH KURLAND.

Application No. 2115/Cal/1975 filed on 5th November 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 9 Claims

A centrifuge comprising a first unit comprising a centrifuge drum rotatably mounted on a substantially horizontal support plate mounted on resilient supports, a drive shaft for plate mounted on resilient supports, a drive snart for the drum coupled to a motor, and a wall surrounding the drum rigidly connected to the support plate to define an inner casing arranged to collect separated liquid; and a second unit comprising an outer casing surrounding the inner casing and arranged to collect separated solid material from the centrifuge drum, and a feed device for feeding material to be centrifuged to the centrifuge drum, wherein the second unit is mounted separately from the first unit so that vibrations in the first unit are not transferred to the second tions in the first unit are not transferred to the second

Compl. specn. 11 pages.

Drg. 1 sheet.

CLASS: 36c

155526

Int. Cl.: B 29 g 2/00.

APPARATUS FOR MAKING HIGH SPEED CORRUGATED PLASTIC TUBING.

Applicant: GERD PAUL HEINRICH LUPKE, 46 STORNOWAY CRESCENT, THORNHILL, ONTARIO, CANADA.

Inventor: Idem.

Application No. 2116/Cal/75 filed on 5th November, 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 15 Claims

A high speed corrugator for producing corrugated thermoplastic tubing comprising:

- a pair of complementary mould assemblies each comprising an endless chain of articulately interconnected mould blocks and means for guiding the mould blocks along an endless track having a forward run and a return run,
- ich mould block being complementary to respective mould block of the other assembly, said mould blocks each mould block cooperating in pairs along said forward run to form an axially extending tunnel defining a tubular mould having a corrugated wall,
- means for driving said endless chains in synchronism for progressively moving the mould blocks along said endless tracks.
- an extrusion head adapted to be fitted to the nozzle of an extrusion machine for forming a tube of thermo-plastic material therefrom,
- means for positioning the mould assemblies so as to locate the extrusion head at the entrance to said tunnel coaxially therewith,
- said extrusion head including first duct means for intro-ducing pressurized air to the interior of the extruded

tube for expanding the tube to conform to the wall of the tubular mould, and second duct means for the passage of cooling air,

baffle means spaced axially from the extrusion head for maintaining a pressurized air space between said baffle means and the extrusion head, and

an air distributing duct communicating with said second duct means, the air distributing duct extending axially along said tunnel beyond said buffle means for distributing cooling air to the interior of the moulded thermoplastic material within said tubular mould.

Compl. specn. 18 pages.

Drg. 3 sheets.

CLASS: 9D

155527

Int. Cl. : C 22 c 21/04.

METHOD OF PRODUCING IMPROVED METAL ALLOY PRODUCTS.

Applicants: ALCAN RESEARCH AND DEVELOP-MENT LIMITED, 1, PLACE VILLE MARIE, MON-TREAL, QUEBEC, CANADA.

: 1. LARRY ROY MORRIS AND 2. JOHN Inventors DAVID THOMSON.

Convention date (United Kingdom) 15th November, 1974 (49639/74).

Application No. 2137/Cal/75 filed on 10th November, 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

### 6 Claims

A method of producing an aluminium-silicon alloy sheet product which comprises casting an aluminium-silicon alloy in the form of a thin slab at a growth rate in excess of 25 cms/min. to solidify silicon in the form of elongated rods in a size range of 0.05-0.5 microns, subjecting the cast slab to at least 60% reduction to fragment said elongated silicon rods into finely divided separate particles, said slab being subjected to at least a final 10% reduction by cold-rolling, to convert it into final sheet form, said cold-rolled sheet being subjected to annealing at a temperature in the range of 250-400°C, said alloy having the following composition. sition:

4 - 15% Cu up to 2% Mg up to 2% Zn up to 2% Fe up to 2% Mn up to 2%

Others up to 0.5% each (up to 1.0% total)

Al remainder

the Fe and Mn content not exceeding 3% in total.

Compl. specn. 17 pages.

Drg. 1 sheet.

CLASS: 116C

155528

Int. Cl. B 21 C 1/02.

LINK CHAIN AND METHOD OF FABRICATING THE SAME.

Applicant: ALEXANDER PERL, D-753 PFORZHEIM NIBELUNGENSTR. 6, FEDERAL REPUBLIC OF GERMANY.

Inventor: IDEM.
Application No. 2172/Cal/75 filed on 13th November,

Appropriate office for opposition proceedings Patents Rules, 1972) the Patent Office, Calcutta. (Rule 4,

# 24 Claims

A link chain composed of a succession of identical links hooked together in an articulated assembly, in which each link reaches through the eyes of two oppositely adjoining links, and wherein a constituent link, when viewed in the direction of its eye aperture, presents the comme of a rectangular frame, defined by a pair of parallel longitudinal leg portions and a pair of transverse linking portions, the leg portions and linking portions giving the eye aperture of the link a generally rectangular of other links, when viewed in the longitudinal directions, a senerally I-shaped continuous profile, its longitudinal leg portions aftereby constituting the two enlarged flange portions of the "I", and its transverse linking portions constituting the narrower intermediate web portion of the "1", the maximum profile width a of the leg portions being, accordingly, substantially larger than the maximum profile width b of the linking portions, with the result that the leg portions of the sasembled links substantially conceal the eye apertures of these links, and the links occupy the major portion of the space circumscribed by a continuous prism, thereby giving the chain a generally prismatic overall shape and a definited pivotability and rotatability between its adjoining links.

Compl. specn. 17 pages.

Dig. 5 sheets.

CLASS: 58B

155529

Int. Cl.: E06 B 3/42.

SLIDING-WING DOOR FOR VEHICLES.

Applicant: SOCIMI SOCIETA CONTRUZIONI INDUSTRIALI MILANO S.p.A., VIA. S. CALIMERO 3, MILAN, ITALY.

Inventor: ALESSANDRO MARZOCCO.

Application No. 2238/Cal/75 filed on 24th November, 1975.

# 18 Claims

A single-parel or twin-panel sliding-wing door for vehicles, each panel being hung to an element of a telescopically extendable guide, another element of said guide being connected to the vehicle body so as to permit a displacement relative thereto, characterized in that said other element of the telescopable guide is rigidly affixed to the movable parts of at least two linear ejectors mounted in a rigid supporting structure affixed to the vehicle body in correspondence with the doorway ceiling, means being provided to cause, at will in either direction, either directly or indirectly, a limited displacement of said movable parts of the linear ejectors and means to control the sliding of the element of the telescopable guide which is solid with the door panel relative to the element which is affixed to the movable parts of the linear ejectors.

Compl. specn. 28 pages.

Drg. 8 sheets.

CLASS: 108 B2(b)

155530

Int. Cl.: C 21 b 11/08.

PROCESS AND APPARATUS FOR THE PRODUCTION OF MOLTEN PIG IRON.

Applicant: ACIERIES REUNIES DE BURBACH-EICH-DUDFLANGE S.A., ARBED, OF AVENUE DE LA LIBERTE, LUXEMBOURG.

Inventor: 1. PAUL METZ AND 2. ADOLPHE FABER.

Application No. 2296/Cal/75 filed on 2nd December, 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 26 Claims

A process for the production of molten pig iron with simultaneous recovery of a reducing gas mixture, which comprises introducing a carbon-containing material into a first zone, in a bath in which the molten pig iron is being produced, in a quantity sufficient to cause supersaturation with carbon of molten iron at least in said first zone; introducing oxygen into an agitated zone of the bath adjacent

to said first zone so as to mix oxygen thoroughly with the contents of the bath whereby excess carbon is converted into carbon monoxide at least some of which forms, or forms a part of, a reducing gas atmosphere above the bath; introducing at least partly pre-reduced iron ore into the bath at, or close to, the agitated zone thereof whereby the ore is melted and molten iron is formed therefrom; tapping off molten pig iron from the bath; and recovering the reducing gas mixture formed above the bath.

Compl. specn. 14 pages.

Drg. 1 sheet.

CLASS: 70C.

155531

Int. Cl.: B 01 k 3/00, L 23 b 9/02, 11/00.

Anodized aluminium. coloured by means of optical interference effects, and process for treatment of anodised aluminium to produce such effects.

Applicants: ALCAN RESEARCH AND DEVELOP-MENT LIMITED, OF 1 PLACE VILLE MARIE, MON-TREAL, QUEBEC, CANADA.

Inventors: PETER GLOFFREY SHEASBY, GRAHAM CHEETHAM, JOS PARTIE, MICHEL BADIA AND TAHEI ASADA.

Application No. 2335/Cal/75 filed December 12, 1975.

Convention date 16th July 1975, United Kingdom (29936/1975).

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

### 11 Claims

An aluminium article having a porous anodic oxide film on its surface, said porous anodic film having a thickness of at least 3 microns, the pores of said coating having inorganic pigmentary material deposited therein, characterized in that the average size of said deposits at their outer ends is at least 260A and the separation between the outer ends of said deposits and the aluminium/aluminium oxide interface being in the range of 500 – 3000A.

Compl. specn. 31 pages.

Drg. 1 sheet.

CLASS: 206 F

155532

Int. Cl.: H 04 1 27/22.

PLURAL FREQUENCY SIGNALLING SYSTEM RECEIVER.

Applicant: THE GENERAL ELECTRIC COMPANY LIMITED, 1, STANHOPE GATE, LONDON WIA 1EH, ENGLAND.

Inventor: EUGENIUSZ ANTOSZEWSKI.

Convention date (United Kingdom) 21st January, 1975 (No. 2571).

Application No. 2385/Cal/75 filed on 24th December, 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 12 Claims

A receiver for use in a signalling system of the kind wherein data is conveyed by transmitting a signal having alternately first and second frequencies comprising: shaping and squaring circuitry for providing in response to the received signal first and second trains of pulses, the two trains having frequencies correspondingly dependent on the frequency of the received signal and the durations of the pulses in each train being small compared with the period of the received signal; a first delay circuit fed with one of said trains of pulses; a second delay circuit fed with one of said trains of pulses; a first coincidence gate circuit having as inputs the output of the first delay circuit and one of said trains of pulses; and a second coincidence gate circuit having as inputs the outputs of said second delay circuit and the other of said trains of pulses; the delays of the delay circuits being such that the first coincidence gate circuit produces an output substantially only when the received

signal has its first frequency; and the second gate circuit second produces an output substantially only when the receiver produces an output substantially only when the received signal has its second frequency.

Compl. specn. 19 pages.

Drg. 2 sheets.

CLASS: 72D

155533

Int. Cl.: F 42 c 19/08.

MULTIPLE FUSE IGNITER.

Applicants: INDIAN EXPLOSIVES LIMITED, OF ICI HOUSE, 34, CHOWRINGHEE ROAD, CALCUTTA-700 016, WEST BENGAL, INDIA.

Inventors: 1. GOPAL MOHAN CHOPRA, 2. KRISHNA-GIRI, ACHUTHA RAMA RAO.

Application No. 2388/Cal/75 filed on 24th December, 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 10 Claims

A multiple fuse igniter for igniting simultaneously a plurality of fuse ends comprising a container having a pyrotechnic composition, means adapted to receive a plurality of fuse ends and a safety fuse end and means for making the container waterproof.

Prov. specn. 7 pages.

Prov. Drg. 1 sheet.

Compl. specn. 10 pages.

,Drg. 1 sheet

CLASSES: 40F & 61K

155534

Inc. Cl.: F26b 17/10.

Improvements in or relating to apparatus for treating particulars material with a gas.

Applicants: USM CORPORATION, 140, FEDERAL STREET, BOSTON, MASSACHUSETTS, UNITED STATES OF AMERICA.

Inventors: 1. JOHN ANDERSON CUBITT AND 2. HENRY ELLWOOD.

Application No. 260/Cal/75 filed on 12th February, 1975.

Convention date 16th February 1974 (U.K.) 7167/74,

Appropriate office for opposition proceeding (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 21 Claims

Apparatus for treating particulate material with gas comprising a trough having an opening or series of openings extending along the bottom of the trough, the trough comprising side walls having side wall portions inclined outwardly at either side of the bottom means for delivering gas under pressure to the opening or openings whereby a stream of gas is directed upwardly through the opening or openings in the operation of the apparatus, the trough having an inlet end portion remote from an open outlet end portion of the trough whereby particulate material introduced into the trough at the inlet end portion can travel along the trough and leave at the outlet end portion in the operation of the apparatus, the apparatus being so constructed and arranged that in the operation thereof particulate material is caused by the stream of gas through the opening or openings to move upwardly in a central region of the trough extending along the trough above the opening or openings and downwardly in regions adjacent the side wall portions in a circulatory motion and to move along the trough from the inlet end portion to the outlet end portion

Compl. specn 24 pages,

Drg. 2 sheets.

CLASS: 70C,

155535

Int. Cl. . C 2° b 3/00, 5/00.

IMPROVEMENTS IN OR RELATING TO ELECTROPI AT NG AT UMINIUM STOCK.

Applicants ALCAN RESEARCH AND DEVELOP-MENT HIMITED OF 1, PLACE VILLE MARIO, MON-TREAL QUEBEC, CANADA.

Inventors , WILLIAM ERNES COOKE, JOHN HODGSON AND MITSUO SASAKI.

Application No. 964/Cal/75 filed on 14th May 1975.

Convention date 24th May 1974 (U.K.) 23442/74.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 9 Claims

A process for the treatment of aluminium rod or wire which comprises passing said rod or wire through a bath containing an electrolyte having a high dissolving power for aluminium oxide and subsequently through a bath containing a metal plating electrolyte, the first mentioned bath having a cathode immersed therein and the second mentioned bath having an anode immersed therein whereby to render the rod or wire anodic in the first bath and cathodic in the metal relating bath, said rod or wire being passed, if dired through one or more electrolytic or non-electrolytic treatment baths between and first mentioned bath and the metal plating bath.

Compl specn 13 pages.

Drg. 1 sheet.

CLASSES: 206E & 187 C1

155536

Int C1 H04q 1/00; 3/00.

A RFLAY MATRIX, ESPECIALLY A REED RELAY MATRIY FOR SWITCHES WITH SEVERAL STEPS IN EIFCTROMICALLY CONTROLLED TELEPHONE EXCHANGES,

Applicants TELEFONAKTIEBOLAGET LM ERICS-SON, 2–126 25 STOCKHOLM, SWEDEN.

Inventors ROYNE GUNNAR HJORTENDÅL AND JOHNS KURT ALVAR OLSSON.

Application No. 1075/Cal/75 filed on 28th May, 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Pules 1972) the Patent Office, Calcutta.

# 16 Claims

A relay matrix, especially a reed relay matrix for switches with several steps in electronically controlled telephone exchanges characterized in that it comprises:

- (a) a first device to apply relay operating voltage on a chosen row conductor in the crossing point network of the matrix by order from a central processor,
- (b) a control device to measure the resulting current of the raw conductor to establish whether any of the 12' x in the marked row already is activated,
- (c) second devices to mark a chosen column in the crossing point network of the matrix by order from the central processor in order to achieve by coincidence with the voltage application of the row conductor an activating signal to the coincidence point
- call littable electronic contact devices, one in each cassing point of the crossing point network, arranged to be activated by said activating signal resulting in that the relay of the associated crossing point operates,

- (e) a further control device to remeasure the resulting current of the marked row conductor in order to establish that one and only one relay takes current, and
- (f) third devices to apply holding voltage on said row conductor by order from the central processor.

Compl. specn. 32 pages.

Drg. 8 sheets.

CLASS: 13C

155537

Int. Cl.: B 65 b 11/00.

CONTROL SEALING SEAM DEVICE OF THERMO-PLASTIC OVERWRAP ON PACKETS.

Applicants: G. D. SOCIETA PER AZIONI, OF VIA COMPONIA, 10, BOLOGNA, ITALY.

Inventor: SERAZNOLI ENZO.

Application No. 1143/Cal/75 filed on 10th June 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules. 1972) the Patent Office, Calcutta.

# 4 Claims

Control sealing seam device of thermoplastic overwrap on packets particularly on overwrapping machines, comprising transferring means movable for transferring packets along a path at a plurality of operating speed levels subject to periodic halts, receptive during each halt of a packet and of a thermoplastic overwrap sheet at a first station for wrapping the packet in the sheet and thereby providing a seam between different portions of the sheet on the packet, said transferring means having a plurality of overwrap sealing stations spaced apart from the first station and from one another along said path, in which said control sealing seam device forecasts:

- a plurality of sealing contrivances each located in a position adjacent to one of the sealing stations II-III and mounted for movement relative so said seam and each sealing contrivances being mounted to effect said movement thereof into and away from contact with said seam in the respective sealing station;
- a plurality of supports, one for each sealing contrivance, for supporting it in said position and for effecting said movement;
- a plurality of control cams, one for each support each being movable in synchronism with the transferring means and each having linkage means for reciprocably shifting the respective support to effect said movement, during each halt of the transferring means, and means for tripping the linkage means of at least one of the control cams in response to changes of said speed levels to keep the total time of contact of the sealing contrivances with said seam substantially constant regardless to the changes of said speed levels.

Compl. specn. 18 pages.

Drg. 2 sheets.

CLASS: 33D

155538

Int. Cl.: B 22 d 13/02; 13/10.

A PROCESS FOR MANUFACTURING SPHEROIDAL GRAPHITI' CASTING PIPFS BY CENTRIFUGAL CASTING IN  $\Lambda$  ROTARY MOULD.

Applicants: PONT-A-MOUSSON S.A., 91, AVENUE DE LA LIBERATION, 54, NANCY (FRANCE).

Inventors · MICHEL, PIERREL.

Application No 1248/Cal/75 filed on 24th June, 1975.

Appropriate office for opposition proceedings (Rule 4. Patents Rules, 1972) the Patent Office, Calcutta,

# 6 Claims

A process for manufacturing spheroidal graphite cast iron pipes by centrifugal casting in a rotary mould, comprising coating the inner surface of the mould with a mixture of silica and bentonite in suspension in water and a thin layer of a powdered inoculating product, pouring liquid iron into the mould from a pouring channel having a pouring end to form a tubular layer of liquid iron in the mould, holding a supply of granular particles of a material having a high heat of fusion and exposed to atmospheric pressure in distributing box means mounted on the pouring channel, opening a bottom part of the box means to cause metered amounts of the granular particles of said material to drop merely under the effect of the force of gravity from the box means onto the liquid iron poured into the mould in a region substantially limited to a front of the liquid iron and outside the stream of liquid iron issuing from the pouring channel, so as to increase the rate of cooling of the liquid iron in the form of a tubular layer in the mould, from a zone of the layer spaced from the mould to the free inner surface of the tubular layer while slowing down the cooling of the liquid iron in the vicinity of the surface of the mould.

Compl. specn. 20 pages.

Drg. 5 sheet.

CLASS: 175H

155539

Int. Cl.: F 16 j 15/00.

A SFALING ARRANGEMENT, MORE PARTICULAR-LY FOR HYDRAULICALLY OPERATED CYLINDER PISTONS OR PISTON RODS.

Applicant and Inventor WALTER HUNGER OF RODENBACHER STRASSE 50, 8770 LOHR/MAIN, FEDERAL REPUBLIC OF GERMANY.

Application No. 1265/Cal/75 filed 26th June 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 9 Claims

A sealing arrangement, more particularly for hydraulically operated cylinder pistons or piston rods, said sealing arrangement comprising one or more ring seals disposed in a groove and formed of soft material with a seal lip in contact with a surface to be sealed and a shaped sliding guide ring of abrasion-resistant material which bears on the surface to be sealed disposed in an annular groove in the ring seal and having side surfaces which converge towards one another as they extend away from said surface to be sealed, said side surfaces being interconnected by a convexly curved internal surface positioned on the side opposite to the seal surface.

Compl. specn. 13 pages

Drg. 1 sheet.

CI ASSES: 134 A & 105 B

155540

Int. Cl : F 21 v 7/00; 7/12.

ILLUMINABLE ELEMENTS ADAPTED TO ACT, INTER ALIA. AS POSITION INDICATORS FOR ROAD VFHICLE CONTROLS.

Applicants: THE LUCAS ELECTRICAL COMPANY LIMITED, WELL STREFT, BIRMINGHAM, B 19 2XF, FNGLAND.

Inventor: KONRAD WERDA.

Convention date (United Kingdom) 17th July, 1974, No. 31566/74.

Application No. 1356/Cal/75 filed on 11th July, 1975.

Appropriate office for opposition proceedings (Rule 4. Patents Rules, 1972) the Patent Office, Calcutta,

### 3 Claims

An illuminable element including an elongate transparent member arranged to receive light at one longitudinal and thereof, the member having a first front elongate face and an opposite rear elongate face, light entering said member at said one end being conducted along the length of the said member by internal reflection from said front and rear faces, some of said light escaping from said member by way of said front face so that indicia, on or adjacent said front face will be illuminated in use, and, said rear face of said member adjacent said one end of the member is flat and parallel to the front face, while adjacent said other end the rear face is externally convex, said convex region of the rear face reflecting more of the light incident thereon towards the front face than said flat region, whereby the reflective properties of said rear face of said member are less adjacent said one longitudinal end so that a more even escape of light is achieved along the length of said front face.

Compl. specn. 7 pages.

Drg. 1 sheet.

CLASS: 68 B

.155541

Int. Cl.: H 01 b 1/00.

AN ELECTRICAL CONDUCTOR FOR AN OVER-HEAD POWER LINE.

Applicants: SOUTHWIRE COMPANY, GEORGIA CORPORATION, OF 126 PERTILLA STREET, CARROLLTON, GEORGIA, 30117, U.S.A.

Inventors: ROGER JOHN SCHOERNER, BOBBY ALONZA RAWLAND, HUGH DORSEY BUTLER, JR., ENRIQUE CALIXTO CHIA AND FRANK RIDELY THRASH, JR.

Application No. 1422/Cal/75 filed on 21st July, 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules. 1972) the Patent Office, Calcutta.

# 14 Claims

An electrical conductor for an overhead power line comprising a steel core and an aluminium component stranded about the core having an electrical conductivity of at least 60° IACS, i.e., International Annealed Copper Standard said aluminum component being in an at least partially annealed condition; characterized in that said at least partially annealed aluminum component is an aluminum base alloy having a yield strength of from 13,000 PSI for an elongation of 5% when fully annealed whereby said aluminum component will act as a load-carrying element when the conductor is strung in between spaced supports and tensioned in excess of 8500 PSI, thus achieving improved qualities of fatigue resistance as compared with prior art at least partially annealed aluminum components which are adapted to carry none of the load under comparabale tensile stresses, while at the same time preventing same in the conductor at elevated temperatures.

Specn. 18 pages,

Drg. 1 sheet.

CLASS: 69D

155542

Int. Cl.: H 01 h 36/00.

AN ELECTRICAL CONTACT UNIT.

Applicants: CUTLER-HAMMER WORLD TRADE, INC., AT 4201 NORTH 27TH STREET, MILWAUKEE, WISCONSIN, 53216, UNITED STATES OF AMERICA.

Inventor: EDMUND MORTON BUTTERWORTH.

Application No. 1556/Cal/75 filed on 8th August, 1975.

Convention date 29th August 1974 United Kingdom (37776/1974).

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta,

2-457 GI/84

### Claims .

An electrical contact unit operably by an electromagnetic device, said device being operable from a spring biased, deenergized first position to a second, energized position, said contact unit comprising, in combination:

- an actuating member positively coupled to the armature of said electromagnetic device for movement therewith;
- a plurality of contact sets disposed for operation by said actuating member, at least one of said contact sets being normally closed when said electromagnetic device is in said first position;
- contact pressure springs for each of said contact sets, said springs operating between the respective movable contact and said actuating member whereby the contact spring for said normally closed contact set provides a bias on said actuating member which is opposed to the bias urging said electromagnetic device to said first position;
- and resilient retaining means coacting between said actuating member, and the body member of said contact unit to retain said actuating member and said electromagnetic device in said first position upon energization of said electromagnetic device until the operating force of the latter exceed a threshold value.

Compl. specn. 9 pages

Drg. 2 sheets.

155543

CLASSES: 24 A B

Int. Cl.: B 60 1 7/00; 11/00.

INDIRECTLY ACTING SHOES PULL-OFF SPRINGS.

Applicant: GIRLING LIMITED, KINGS ROAD, TYSE-LEY, BIRMINGHAM 11, ENGLAND.

Inventors: 1. DAVID CHARLES SEXTON AND 2. ROBERT JOHN SMITH.

Convention date (United Kingdom) 4th September, 1974, No. 38651/74.

Application No. 1582/Cal/75 filed on 13th August, 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 7 Claims

An internal shoe drum brake comprising a pair of opposed brake shoes, and a separate spring means extending along-side and generally parallel to each brake shoe, each spring means having one end anchored relative to its associated brake shoe and the opposite end thereof connected by a force transmitting means to the other shoe for transmitting tension force in the spring to the other brake shoe to pull the two shoes towards each other.

Compl. specn. 7 pages.

Drg. 1 sheet.

**CLASS: 116 F** 

155544

Int. Cl. B66 & 11/00.

APPARATUS FOR THE CONTROL SYSTEM OF AN ELEVATOR CAR.

Applicants: OTIS ELEVATOR COMPANY, OF 750 THIRD AVENUE, NEW YORK, NEW YORK 10017, UNITED STATES OF AMERICA.

Inventor: JOHN JOSEPH FAUP.

Application No. 1624/Cal/75' filed on 20th August 1975.
Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 6 Claims

Apparatus for the control system of an elevator car which accelerates in accordance with a prescribed pattern, said apparatus generating signal to initiate stopping sequences for the car and including, a position responsive device operating in response to the location of the car at that prede-

termined distance from a landing at which a stopping operation is to be initiated when the car is travelling at its rated speed in order for it to decelerate in a desired manner rated speed in order for it to decelerate in a desired manner to a stop at said landing; call registering unit operable register calls for service for said landing; a stopping switch operating in response to the operation of said position responsive device and to the existence of the registration of a call for said landing when said cat is travelling at said rated speed to initiate a stopping operation to decelerate said car in said desired manner to a stop at said landing; said apparatus being characterized by delay equipment operating on those strips in which the car is travelling at less than apparatus being characterized by delay equipment operating on those strips in which the car is travelling at less than its rated speed when it arrives at said predetermined distance from said landing sensing the arrival of the car at said predetermined distance from said landing while travelling at least than said rated speed and operating to enable said stopping switch to initiate a stopping operating in response to a call for said landing registered after said car approaches closer to said landing than eaid predetermined distance. closer to said landing than said predetermined distance.

Compl. specn 21 pages.

Drg. 3 sheets.

CLASS: 129 B

155545

Int. Cl.: B 21 c 37/00.

METHOD OF MAKING A REINFORCING STRIP.

Applicants: N. V. BFKAERT S. A., OF 8550 ZWEVF-GEM, BFI GIUM.

Inventors: MARC NIS, FRITS JAHANNES ANKOLDUS DE KOK. VANASSCHE AND

Application No. 1703/Cal/75 filed on 3rd September,

Convention date U. K 27th September 1974 (42142/74). Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 16 Claims

A method of making a reinforcing strip comprising pro-yiding a strip of welded were mesh comprising a plurality of longitudinal wires and a plurality of spaced-apart trans-verse wires welded to said longitudinal wires, the length of longitudinal wire between adjacent transverse wires being subs-tantially uniform across the width of said strip, and deforming tantially uniform across the width of said strip, and deforming by a method such as herein described at least some of said longitudinal wires to produce a deformation in said at least some of said longitudinal wires which deformation increases progressively across said strip

Compl. specn. 9 pages.

Drg. 1 sheet

**CLASS** : 107 B

155546

Int. Cl.: F 02 d 9/00.

A POWER UNIT COMPRISING A SUPERCHARGED FUEL INJECTION INTERNAL COMBUSTION ENGINE.

Applicants: ETAT FRANCAIS, OF 14, RUE DOMINIQUE, 75997 PARIS ARMEES, FRANCE. SAINT-

Inventor : JFAN MELCHIOR AND THIERRY ANDRE. Application No. 1734/Cal/75 filed on 10th September. 1975.

Appropriate office for or position proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 14 Claims

A power unit comprising

- a fuel injection internal combustion engine; a turbine-compressor unit for supercharging the engine and having at least one compressor and at least one turbine driving the compressor;
- a by-pass pipe through which all the air at supercharging pressure from the compressor which is not charged into the engine flows into the turbine; and auxiliary combusion chamber disposed upstream of the turbine and receiving the air flowing in the ty-pass pipe; and

- a device for supplying fuel to the auxiliary combustion chamber, comprising mains for regulating the flow rate of fuel supplied to the auxiliary chamber, said regulating means having means for providing a set value of the supercharging pressure and means for delivering fuel to said auxiliary combustion chamber when necessary to prevent the supercharging pressure from falling below the set value,
- in which power unit said means for providing the set value includes sensing means sensitive to the quantity of fuel injected per cycle into the engine for varying said set value as a function of the quantity of fuel injected per cycle into the engine.

Compl. specn 22 pages

Drg. 4 sheets.

CLASS: 94 G

155547

Int. Cl . B 02 c 19/00.

APPARATUS FOR COMMINUTING. MIXING HOMOGENISING SOLID OR LIQUID SUBSTANCES.

Applicant GENFRAI COMMINUTION INC., LESLIE STRFET, DON MILLS, ONTARIO, CAN M 3 B 2 M 3 FORMERLY OF SUIT 2800, 390 STREET, TORONTO, ONTARIO, CANADA. 1993 CANADA 390 BAY

Inventors: CYNTHIA SZFGO

Application No. 1798/Cal/75 filed on 20th September,

Appropriate office for epposition proceeding Patents Rules, 1972) the Patent Office, Calcutta opposition proceedings (Rule 4,

# 17 Claims

- 1. Apparatus for comminuting, mixing or homogenizing solid or liquid substances, comprising:
  - (a) a mass having a first central longitudinal axis and having an outer surface;
  - (b) a chamber having a second longitudinal axis parallel to said first axis and having an inner surface of contour conforming axially substantially to that of said outer surface:
  - (c) rotary support means rotatable about said second axis and supporting said mass for free rotation about said first axis and for contact of said outer surface with said inner surface;
  - (d) drive means for rotating said rotary support means to rotate said mass around said inner surface;
  - said rotary support means including a pair of longitudinally spaced apart support arms, a flexible longitudinally spaced apart support arms, a flexible wire rope extending along said first axis between said support arms and connected at its ends to said support arms, and means mounting said mass on said wire rope between the ends of said rope, said rope thereby constituting a flexible axle supporting said mass to enable radial movement of said mass and to enable tilting of said mass about said first axis, so that under rotation imparted by said drive means to said rotary support means, said mass will be impelled under centrifugal force generally radially outwardly of said rotary support means and will be pressed into contact with said inner surface of said chamber and will roll therearound, and so that said sass may tilt in the presence of a partile located between said outer surface of said mass and said inner surface of said chamber, thereby applying a crushing force of said chamber thereby applying a crushing force constituted by both centrifugal and gyroscopic forces, against said particle

Compl. specn. 16 pages,

Drg. 3 sheets.

CLASS: 66 B; 69L, D

155548

Int. Cl.: G 03 b 15/00.

A FLASHLIGHT COMPRISING A LENS AND RE-FLECTOR UNIT.

Applicants: UNION CARBIDE CORPORATION, AT 270 PARK AVENUE, NEW YORK, STATE OF NEW YORK-10017, U.S.A.

Application No. 1846/Cal/75 filed 25th September, 1975.

Inventor: ROBERT EDWIN BRINDLEY.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) the Patent Office, Calcutta.

# 9 Claims

A flashlight comprising a lens and reflector unit having a front open end adapted to be detachably mounted to a battery casing and having a lens, a lens ring, a lamp holder adapted to accommodate a lamp and containing a first contact means therein; a battery casing provided with a first open end adapted to receive a battery means and adapted to be detachably mounted to an end cap for securing battery means therein, a second open end at the opposite end thereof adapted to be detachably mounted to the front open end of the lens and reflector unit, and wherein second contact means are provided for electrically connecting the interior vicinity of the end cap to said first contact means; characterized in that a push button switch fixedly secured on a mounting bracket disposed within the second open end of the battery casing with the button member of the switch disposed within an opening in the wall of the battery casing adjacent the second open end thereof; a housing member substantially disposed on the outer surface of the battery casing and having an opening disposed therein with magnetic means disposed in the surface of said housing member adjacent said opening, said housing member aligned and secured to the battery casing such that the opening in said housing member is aligned with opening in the wall of the casing so as to accommodate the button member of the switch disposed in the opening in the wall of the casing; a flexible boot member disposed and secured over the opening in the housing member so that upon being depressed the boot will in turn depress the button member of the switch; and third contact means adapted through actuation of the push button switch in the presence of a lamp and battery means assembled in the flashlight to complete or interrupt the continuity of an electrical circuit between the lamp and the battery means.

Compl. specn. 23 pages.

Drg. 4 sheets.

CLASS: 206E, G and I.

155549

Int. Cl.: H03b 3/00; G01d 5/00.

A PLURAL FREQUENCY SIGNALLING SYSTEM.

Applicant: THE GENERAL ELECTRIC COMPANY LIMITED, 1, STANHOPE GATE, LONDON WIA 1EH, ENGLAND.

Inventor: EUGENIUSZ ANTOSZEWSKI.
Application No. 1873/Cal/75 filed on 30th September, 1975.

Convention date (United Kingdom) 3rd October, 1974, No. 42978/74.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 9 Claims

A plural frequency signalling system comprising a first transmitter for transmitting a signal which alternates between a predetermined first and a predetermined second frequency; a second transmitter for transmitting a signal which alternates between a predetermined third and a predetermined fourth frequency; a first receiver for producing in response to the signal transmitted by said first transmitter a train of pulses in which the pulses have durations dependent on the periods for which said first transmitter signal has said second frequency; a second receiver for producing in response to the

signal transmitted by said second transmitter a train of pulses in which the pulses have durations dependent on the periods for which said second transmitter signal has said fourth frequency characterized in that there is provided a common transmitter control circuit for controlling in synchronism the periods for which said frequencies are transmitted; and a common output circuit for producing an output signal in response to the co-existence, for at least a predetermined period, of pulses in the trains of pulses produced by said two receivers.

Compl. specn. 17 pages.

Drgs. 2 sheets.

CLASS: 33D.

155550

Int. Cl. B22d 37/00.

SLIDABLE GATE MECHANISM.

Applicant: USS ENGINEERS AND CONSULTANTS, INC., 600 GRANT STREET, PITTSBURGH, STATE OF PENNSYLVANIA, U.S.A.

Inventor: CHARLES HENRY BODE (JR.).

Application No. 1894/Cal/75 filed on 3rd October, 1975.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

### 7 Claims

The cobination, with a bottom-pour vessel having an outlet in its bottom wall, a gate, means on the bottom wall slidably supporting said gate, whereby said gate may control flow of material through said outlet, and motive means for moving said gate back and forth to open or close said outlet, of a mechanism urging said gate upwardly with respect to said bottom wall, said mechanism comprising at least one spring, a support on the side wall of the vessel supporting said spring at a location at said side wall and remote from said gate, and force-transmitting means connecting said spring with said gate for transmitting the force of said spring to said gate.

Compl. specn. 9 pages.

Int. Cl.: B23k 25/00.

Drgs. 4 sheets.

CLASS: 129-G.

155**5**51

METHOD OF ELECTROSLAG WELDING OF LIGHT

Applicant: INSTITUT ELEKTROSVARKI IMENI E.O. PATONA AKADEMII NAUK UKRAINSKOI SSR. OF KIEV, ULITSA BOZHENKO, 11, USSR.

Inventors: ANATOLY NIKOLAEVICH SAFONNIKOV & ANATOLY VLADIMIROVICH ANTONOV.

Application No. 1052/Cal/81 filed on September 22, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 10 Claims

A method of electroslag welding of light metals, comprising mounting on supports the parts to be welded with a required gap therebetween, mounting a forming device on the said parts to be welded and an electrode in the gap between the said parts to be welded, filling the gap between the said electrode and the said parts to be welded with a flux, setting up a slag pool, melting the electrode and the edges of the said parts being welded with the formulation of a metal pool, accumulating the metal pool outside the gap above the edges being welded, maintaining the metal pool in the liquid state, shifting the slag pool and filling the gap with the liquid metal after the termination of fushion of the electrode and accumulation of the metal pool in a volume required for filling the gap considering weld reinforcement, and solidifying the liquid metal.

Compl. specn. 19 pages. Drgs. 2 sheets.

CLASS:  $32F_2b$ ,  $55E_4$  &  $60X_2d$ .

155552

Int. Cl. C07d 39/02.

PROCESS FOR THE MANUFACTURE OF NEW EPO-XIDE OF BENZOPHENANTHRIDINE ALKALOIDS.

Applicant: QUATRUM-EMPRESA NACIONAL DE QUIMICA ORGANICA S.A.R.L. OF AVENIDA JOAO XX1, 10, 6TH FLOOR RIGHT, 1000 LISBON, PORTUGAL.

Inventors : JOSE MANUEL GASPAR PEREIRA, & JOA-QUIM DA ROCHA MADUREIRA.

Application No. 1179/Cal/82 filed October 12, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 6 Claims

Process for the preparation of new epoxides of benzophenanthridine alkaloids, in salt form, either isolated or in their mixtures.

with the general formulae 1 to VI.

$$R_{1} \circ \begin{array}{c} & & & \\ &$$

$$R_{10}$$
 $OR_{2}$ 
 $OR_{3}$ 
 $OR_{4}$ 
 $OR_{5}$ 
 $OR_{4}$ 
 $OR_{5}$ 
 $OR_{4}$ 
 $OR_{5}$ 
 $OR_{5}$ 
 $OR_{5}$ 
 $OR_{5}$ 
 $OR_{5}$ 
 $OR_{5}$ 
 $OR_{5}$ 
 $OR_{5}$ 
 $OR_{5}$ 

$$R_{1}^{0}$$
 $X^{-}$ 
 $(V)$ 

$$R_{1}^{\circ}$$
 $R_{5}^{\circ}$ 
 $R_{5}^{\circ}$ 
 $(VI)$ 

wherein  $R_1$ ,  $R_2$ ,  $R_3$ .  $R_4$  and  $R_5$  can be hydrogen or alkyl and X- stands for halide, nitrate, perchlorate, sulphate, acid sulphate or carboxylate or in the form of the corresponding bases, either isolated or in their mixtures, with the formulae VII to XII.

(IX)

(X)

$$R_{20}$$
 $R_{1}$ 
 $R_{5}$ 
 $R_{5}$ 
 $R_{6}$ 
 $R_{10}$ 
 $R_{10$ 

wherein  $R_1$  to  $R_5$  and X— have the meanings mentioned above, and  $R_6$  is hydrogen or alkyl, characterized by the epoxidation of the respective benzophenanthridine alkaloids being performed in the form of salt, isolated or in their mixtures with the general formulae IA to VIA.

(III-A)

(IA)

(III-A)

$$R_{5}$$
 $R_{7}$ 
 $R_{7}$ 

(IV-A)

wherein  $R_1$  to  $R_5$  and X— have the previously referred meanings or, in the form of the corresponding bases, either isolated or in their mixtures, with the general formulae (VIIA) to (XIIIA).

wherein R<sub>1</sub> to R<sub>6</sub> and X have the meanings previously cited.

Compl. specn. 14 pages.

Drgs. 5 sheets.

CLASS: 176F.

155553

Int. Cl.: F22b 5/00.

BOILER AND METHOD OF HEATING LIQUID.

Applicant STONE INTERNATIONAL LIMITED OF 56 SECOND AVENUE, PENSNETT TRADING ESTATE, BRIERLEY HILL, WEST MIDLANDS, ENGLAND.

Inventors: MICHAEL JOHN VIRR AND RICHARD BURROWS.

Application No. 234/Cal/81 filed March 4, 1981.

Convention date: 4th March 1980 (8007308) U.K.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 7 Claims

A boiler comprising a combustion chamber which, in use, contains a fluidised bed of particles, inlet means for admitting a fluidising gas to the bed and which, in use, defines a lower boundary of the bed the inlet means including respective parts which lie at different levels so that when an upper surface of the bed is level the bed has a deeper part and a shallower part, charging means for charging combustibe material into the deeper part of the bed without depositing the material on the surface of the shallower part of the bed and a plurality of tubes for conveying through the bed fluid which is to be heated, each of said tubes extending through the bed from a lower position to a higher position, whereby the fluid can flow through the tubes by natural convention.

Compl. specn. 11 pages.

Dras. 1 sheet.

CLASS: 134D.

155554

Int. Cl. B62d 13/00.

STEERING DEVICE FOR MANY-AXLED GOOSE-NECK TRAILERS.

Applicant & Inventor: SVERRE DAMM OF GAMLE-VEIEN 1, N-1473 SKARER, NORWAY.

Application No. 262/Cal/81 filed March 11, 1981,

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 4 Claims

Steering device for many-axled goose-neck trailer (2, 5) which is coupled behind a tracking vehicle (1), behind another trailer (2) or behind a dolly (15) the goose neck (3, 16) of the trailer being coupled with a vehicle in front of it via a pivotable and tiltable disc (4, 15) which, when driving in curves, by means of a transmission forcibly steers the rear wheel set oppositely to the steering wheels of the tracking vehicle, so that the trailer is brought to follow, to the greatest possible extent, the track of the tracking vehicle, at least the wheels (9a, 9b; 12a, 12b) of the rearmost wheel set are forcibly steered through said transmission, characterized in that the front wheel set (6.10) at or adjacent the front of the trailer and at least another rear wheel set (8a, 8b) of the trailer (2, 5) are trailing wheel sets.

Compl. specn. 9 pages.

Drgs. 2 sheets.

CLASS: 32F2b. 55E4 & 60X2d.

155555

Int. Cl.: C07d 99/06.

PROCESS FOR THE PREPARATION OF 5, 6, 7, 7A-TETRAHYDRO-4H-THIENO (3, 2-C) PYRIDIN-2-ONE DERIVATIVES.

Applicant: SANFI, OF 40 AVENUE GEORGE V, 75008, PARIS, FRANCE.

Inventore: NORIOSUZUKI, KYNICHI MATSUBAYA-CHI AND SHINICHIRO ASHIDA. AND JEAN PIERRE MAFFRAND.

Application No 1237/Cal/81 filed November 6, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 8 Claims

Process for the preparation of 5, 6, 7, 7a-tetrahydro-4-H-pvridin-2-one derivatives of the general formula I.

in which R is a hydrogen atom or a phenyl radical optionally substituted by at least one halogen atom, lower alkyl radical, lower alkoxy radical, nitro group carboxy group, alkoxycarbonyl radical or cyano group; R' is a hydrogen atom or a lower alkyl radical and n is 0, 1, 3 or 4 and of their addition salts with mineral or organic acids wherein a compound of the general formula 11.

in which R, R' and n have the same meanings as above and R'' is a hydrogen atom or an alkyl radical containing up to 4 carbon atoms, is treated in an organic solvent with gaseous hydrogen chloride and gaseous hydrogen sulphide.

Compl. specn. 11 pages.

Drg. 1 shect.

155556

CLASS: 40A<sub>1</sub>, & 32B.

Int. Cl.: C07c 5/22, 15/08.

"XYLENE ISOMERIZATION".

Applicant: MOBIL OIL CORPORATION, OF 150 EAST 42ND STREET, NEW YORK, NEW YORK 10017, UNITED STATES OF AMERICA.

Inventors: YUNG FENG CHU, AND ARTHUR WAR-REN CHESTER.

Application No. 127/Cal/82 filed February 2, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 13 Claims

Process for isomerizing the zylene content of a charge mixture of aromatic hydrocarbon compounds having eight carbon atoms, which mixture and hydrogen at conversion conditions with a catalyst comprising a hydrogenation component and a crystalline zeolite having a silica to aluminaratio grater than 12 and a contraint index of 1 to 12, characterized by maintaining a conversion temperature of from 550° to 800°F.

using a catalyst that has been steam treated to control is acid activity to a measure alpha value of 45 to 110 and conducting at a space velocity effective to produce both a para xylene content of the xylenes at least 98% of that required for thermodynamic equilibrium and a predetermined percentage of conversion of the ethylbenzene content of the charge mixture.

Compl. specn. 26 pages.

Drgs, 1 sheet.

CLASS: 107-C & G.

155557

Int. Cl.: F02d 15/00.

"AN INTERNAL COMBUSTION ENGINE".

Applicant: NATIONAL AERONAUTICS AND SPACE ADMINISTRATION NASA HEADQUARTERS, WASHINGTON, D.C. U.S.A.,

Inventor: JAMES WILLIAM AKKERMAN.

Application No. 147/Cal/82 filed February 8, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

### 9 Claims

An internal combustion engine having at least one cylinder including a piston and firing chamber, an intake duct into which an air fuel mixture is throttled to control engine power level, a connecting rod, a crank pin, and an accentric sleeve interposed between said rod and pin, characterized by; latch-ing means carried by said sleeve and rod, and means responsive to the pressure in said firing chamber operatively connected to said latching means for shifting same into latching relationship with the rod.

Compl. specn. 14 pages.

Drgs. 3 sheets.

CLASS: 61-A.

155558

Int, Cl.: F26b 21/00.

IMPROVEMENTS IN OR RELATING TO A DEVICE DIRECT-MIX HEATING OF AIR.

Applicant & Inventor: SANTOSH KUMAR DE, OF 47/2, RUSSA- ROAD EAST 1ST LANE, CALCUTTA-33, WEST BENGAL.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 11 Claims

A device for direct-mix heating of air comprising a duct acting as a primary mixing chamber, one end of which is connected to the suction side of an air blower, and which gas proportion control member fitted telescopically on the duct, the said control member having an air-hot gas inlet, and an intermediate chamber having at one end an inlet for hot gases, products of combustion supplied from a fine-nace, and an opening for discharge of the hot gases into the atmosphere, and at the other end a horizontal opening for supply of hot gases into the duct through the said control member disposed below and remote from the other said opening for discharging hot gases into the atmosphere, the inlet of the said control member being horizontally aligned with the said horizontal opening.

Compl. specn. 21 pages.

Drgs. 2 sheets.

CLASS 32F2a, 55E2 & 60Xad.

155559

Int C1. · C07c 87/40.

PROCESS FOR THE PREPARATION OF 1-N[2-(2-DI-METHYLAMINOETHOXY) ACETYL-AMINO] ADA-MANTANE PHOSPHONACETATE".

Applicant: AUSOINA FARMACEUTICI S.R.L. OF VIA LAURENTINA KM 24730, 00040 ROMEZIA (ROME). ITALY.

Inventor · LEONARDO DE VINCENTIIS.

Application No. 1276/Cal/82 filed October 29, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 1 Claim

A process for the preparation of 1-NI2-(2-dinethylaminoethoxy) acetyl-aminol adamantane phosphonacetate of the formula shown in Fig. 1. characterized in that phosphonacetic acid and 1-N[2-(2-dimethylaminoethoxy) acetyl-aminol adamantane (tromantadine) in a molar ratio substantially equal to 1 · 2 are reacted in polar solvents, such as water or- preferably- lower alcohols and that the salt so formed is isolated by a evaporation of the solution or the addition of non-solvents thereof

Compl specn 9 pages

Drgs. 1 sheet.

CLASS: 32E & 55F

155560

In+ Cl · C08f 25/00

"PROCESS FOR PREPARING BIOI OGICALIY ACTIVE LATEX CONJUGATES"

· BEHRINGWERKE AKTIFNGFSELLS-CHAFT OF D-3550 MARBURG/LAHN FEDERAL RE-PUBLIC OF GERMANY.

Inventors: HANS-FRWIN PAULY, (2) WOLFGANG KAPMEYER & ULRICH SHIZ.

Application No 1308/Cal/82 filed November 8, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Process Office Carcutta.

### 2 Claims

Process for preparing biologically active latex conjugates from a biologically active substance having at least one free amine group and a latex composed of a core of a conventional latex and a shell of a copolymer of one or more ethylenic unsaturated monomers and a monomer of the formula 1.

wherein n denotes 1-6 R<sub>1</sub> denotes H; R<sub>2</sub> denotes H or CHs; and R<sub>3</sub> and R<sub>4</sub> denote C<sub>2</sub>-C<sub>5</sub> alkyl, aryl or another group which ensures that the compounds of the formula 1 have sufficient insolubility in water, said process comprising-

- (a) graft copolymerization of a conventional latex by mixing this latex with a monomer of the formula 1 and one or more ethylenic unsaturated monomer and a detergent and initiating polymerization by addition of a radical producer;
- (b) brief acidification of the latex composition to produce aldehyde from acetal groups and
- (c) binding to said latex composition a biologically active substance via its amino groups by reductive alkylation and removing unbound material.

Compl specn. 15 pages

Drgs. 1 sheet.

155561

CLASS: 83B3.

Int. Cl. A231 1/16.

METHOD OF PREPARING DRIED NOODLES".

Applicant: HOUSE FOOD INDUSTRIAL COMPANY LIMITED, OF NO. 5-7, 2-CHOME, MIKURIYASAKAE-MACHI, HIGASHI. OSAKA-SHI, OSAKA-FU, JAPAN.

inventors: (1) KO SUGISAWA. (2) FUMIO MATSUI, (3) YOZO YAMAMOTO. (4) RYUSUKE NAKANAGA. (5) NOBUJI TAKEDA. (6) YOSHIMASA FUJII, (7) YOSHITAKA HIRANO

Application No. 1309/Cal/82 filed November 8, 1982.

Appropriate office for opposition coccedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 9 Claims

A method of preparing dried noodles having a moisture content of less that 15% by weight which comprises preparin raw noodles having a moisture content of 35.45% by weight and dehydrating said raw noodles by blowing superheated steam having a temperature ranging between 120-350°C at a rate of 2-13m/sec onto raw noodles whereby maintaining a water evaporation rate of 0.25 — 1.00g/second per 100g of said raw noodles

Compl specn 26 pages

Drgs. Nil.

CLASS · 167C & 168C

155562

Int. C1 · B07c 5/10· 5/34 "APPARATIS FOR DETECTING AND MEASURING BLEMISHES ON THE SURFACE OF AN ARTICLE".

Applicant · SUNKIST GROWERS INC 720 EAST STREET ONRAPIO CALIFORNIA, UNITED STATES OF AMERICA

TIM DENNIS CONWAY & PAUL FRANK Invantor PADDOCK

Application No 486/Cal/79 filed May 10, 1979.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 2 Claims

Apparatus for detecting blemishes on the surface of an article as herein described, said apparatus comprising: an apparatus defining a substantially planar, examining region; a source of illumination operable when the article is disposed in the examining region for illuminating the surface of the article, whereby light is reflected from blemished and unblemished portions of the surface to different degrees; a camera for sensing light reflected from the surface of the article said camera comprising a plurality of phototrans ducers arranged in a coplanar relationship on the periphery of said examining region and adapted to sense light reflected from the portion of the surface of the article that intersects the examining region, said portion being a circumferential swath on the surface of the article, a reader for reading the outputs of said plurality of phototransducers in a sequential and repetitive fashion, thereby forming a sequence of light intensity measurements each of said measurements corresponding to the intensity of light reflected from a discrete segmental area on the surface of the article; and means for processing the sequence of light intensity measurements to produce a measure of blemishes on the surface of the article.

Compl. specn. 48 pages.

Drgs. 11 sheets.

CLASS: 62-D.

155563

Int. Cl.: D06m 1/00.

"IMPROVEMENTS IN AND RELATING TO METHOD FOR PROCESSING JUTE AND ALLIED FIBRES FOR SPINNING INTO JUTE".

Applicant: INDIAN JUTE INDUSTRIES RESEARCH ASSOCIATION, OF 17. TARATOLA ROAD, CALCUTTA-700088, WEST BENGAL, INDIA.

Inventors: BIPLAB KUMAR SARKAR, (2) SAMAP SENGUPTA, (3) UTPAL KUMAR GHOSH, (4) DR. ADITYA SEKHAR DUTT & DR. ASHIMANANDA RAY.

Application No. 778/Cal/81 filed July 13, 1981. Compl. specn. left 13th October, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta,

# 9 Claims

In a method for processing jute and allied fibres prior to processing them for spinning into varn the improvement comprising treatment of the fibres, with chemicals capable of removing hydrogen bonds and gummy matter from said fibres said chemicals being selected from mild alkaline materials such as codium carbonate, sodium phosphate, borax, ammonia oxelate and alkaline hydroxides like sodium and potassium hydroxides, the treatment with chemicals being either prior to treatment of fibre with batching oil emulsion using an caucous solution of said chemicals or during batching oil emulsion treatment by including the desired chemicals in the interbatching oil emulsion said chemicals being used from 0.1 to 5.0 percent by weight of the treating aqueous solution or batching oil emulsion as the case is.

Compl. specn. 13 pages. Prov. specn. 6 pages.

Drg. Nil

CLASS : 129-G.

155564

Int. Cl. B 21 d 11/06.

APPARATUS FOR CONCENTRICALLY GUIDING THE LEADING FND OF THIN HOT-ROLLED FLAT METAL STRIP.

Applicant: KLOCKNER-WERKE AKTIENGESELLS-CHAFT. OF KLOCKNER-STRASSE 29. DUISBURG 1, WEST GERMANY.

Inventor: 1. KARL-ERNST WIECHMANN.

Application No. 795/Cal/81 filed July 16, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 15 Claims

Apparatus for concentrically guiding the leading end of thin, hot-rolled flat metal strip into the feed guides of a coiling machine in continuous strip mills, characterised in that there is provided at least one linear motor which is disposed upstream of said feed guides and between two rollers of the roller table of the strip mill so that the direction of the moving field of said linear motor is transverse to the direction of feed of the strip through the apparatus, the or each linear motor without making physical contact with the strip material acting to impart a sideways thrust as herein described to the leading end of the strip in a transverse direction relative to the direction of strip feed whenever the centre of said leading end of the strip deviates from the middle of the roller table.

Compl. specn. 21 pages.

Drgs. 8 sheets.

CLASS: 23-A; 143-D4.

155565

Int. Ci.: B 65 b 3/00.

METHOD OF PRODUCING A PACKAGE OF A PRODUCT, AND THE PACKAGED PRODUCT.

Applicant: METAL BOX LIMITED OF QUEENS HOUSE, FORBURY ROAD, READING RG1 3JH, BERKSHIRE, ENGLAND.

Inventors: 3. JOHN ALFRED PERIGO, 2. JOHN EDWIN DIVALL.

Application No. 879/Cal/81 filed August 7, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 22 claims

A method of producing a package of a product such as for example those herein described, which product does not include a significant amount of gas, comprising the steps of taking a shape retaining container made of a material which is softened at the temperatures employed in heat-sterilisation, and which has a charging opening, charging the container with the product to a level which leaves a headspace, substantially eliminating permanent gas from the headspace, seating the opening with a closure, and deforming the closure inwardly onto the product to reduce the headspace and containing the deformation to move product adiacent the closure into the remaining headspace, until the headspace is eliminated by the continued movement of product and closure, wherein:

- (a) the sealing step is achieved by heat-sealing the closure around the opening.
- (b) the closure is located against the sealing area of the container before the headspace is eliminated.
- (c) the closure is of stretchable material and in the deformation step is stretched beyond its elastic limit so as not to tend to return to its original form,
- (d) the product charge is sufficiently liquid or mobile not to tend to assume any specific natural shape,
- (e) the sealed package is heat sterilised, resulting in softening of the container material, and
- (f) during heat strerilisation an external pressure is maintained at least sufficient to counter development of steam in the package.

whereby a sterilized package is produced in which the integrity of the seal is preserved and, despite said softening, the container has the same shape as it had prior to heat sterilization.

Compl. specn. 24 pages. Drgs. 4 sheets.

CLASS: 126-B.

155566.

Int. Cl. G 01 v 3/00.

FLECTROMAGNETIC LOGGING TOOL FOR INVESTIGATING BOREHOLES.

Applicant: \$CHLUMBERGER LIMITED. OF 277 PARK AVENUE. NEW LORK, N. Y. 10172, UNITED STATES OF AMERICA.

Inventor: 1. YVON THORAVAL.

Application No. 1146/Cal/81 filed October 17, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 47 claims

Electromagnetic logging tool for investigating boreholes by measuring the propagation characteristics of an electromagnetic wave in the medium surrounding the borehole going through geological formations, comprising a sonde (40) capable of being moved in this borehole, means on this sonde capable of carrying out a conversion between electric signals in the sounde and electromagnetic energy signals propagating in the surrounding medium, characterized in that said means comprise at least one electricity conducting elongated first element (105) placed opposite and at a distance from the first element (102) over the entire useful length of the latter, the opposite portions of the first and second element being separated by a medium not conducting electricity (100) and connected electrically to each other at one end (106) of the useful length of the first element.

(Compl. specn. 65 pages. Drgs. 7 sheet.

CLASS: 151-C,

155567.

Int. Cl. F 16 1 11/12, 11/16.

FLEXIBLE HOSE.

Applicant<sup>®</sup>: STANDARD HOSE LIMITED, OF OWLER INGS MILL, OWLER INGS ROAD, BRIGHTHOUSE, WEST YORKSHIRE, HD6 1EJ, ENGLAND.

Inventor 1. BARRIE FINBARR WITHWORTH.

Application No. 1174/Cal/81 filed October 22, 1981.

Convention dated the 22nd October, 1980 (80.34064) U.K.

Appropriate office for opposition proceedings (Rule 4, Patents, Rules, 1972) Patent Office, Calcutta.

# 9 claims

A flexible hose which comprises a flexible helically convoluted tube (10) wound helically with a reinforcing profilled strip (14) the strip having a cross-section such that the second moment of area of the cross-section with respect to a neutral axis, substantially parallel to the longitudinal axis of the convoluted tube, is greater than the second moment of area with respect to any other neutral axis of the cross-section, and the strip not forming part of or being adhered to the flexible tube.

Compl. specn. 8 pages. Drg. 1 sheet.

**CLASS**: 146-C.

155568.

Int. Cl. G 01 f 23/00.

APPARATUS FOR MEASURING AND INDICATING THE FLUID LEVEL IN VESSELS.

Applicant & Inventor: BRAJNANDAN SINHA, OF 17 TUNNLANDSVAGEN; S-175 46 JARFALLA, SWEDEN.

Application No. 1200/Cal/81 filed October 28, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 10 claims

An apparatus for measuring and indicating the fluid level in vessels, wherein a mechanically pulsing device (3) is positioned externally of the vessel (1) so as to induce oscillations of the wall of the vessel, the frequency and amplitude of said oscillations being depending on the filling degree of the vessel a transducer (5: 13) adapted to externally contact the wall for sensing the wall oscillation progress for the particular silling degree of the vessel (1), the output signal from the transducer being an undulating, damped voltage (Fig. 3) representative of the frequency and amplitude of the mechanically induced oscillations: a processing unit (9) connected to the output of the transducer and including means for filtering the output signal of the transducer to form a decaying sine wave, and means for determining the frequency thereof to produce a signal indicative of the filling degree of the vessel; and in indicator (10) connected to the output of said 3—457 GI/84

determining means for displaying the value of said filling degree.

Compl. specn. 12 pages. Drgs. 4 sheets.

CLASS: 172-D1.

155569.

Int. Cl. D 01 h 1/18.

SPINNING MACHINE, IN PARTICULAR RING SPINNING MACHINE.

Applicant: MASCHINENFABRIK RIETER A. G., OF WINTERTHUR, SWITZERLAND.

Inventor: 1. HEINZ ZINGEL.

Application No. 1228/Cal/81 filed November 4, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

### 10 claims

Spinning machine, in particular ring spinning machine, with a plurality of spinning positions arranged in a row, to each of which spinning positions at least one roving bobbin support device is coordinated, characterized in that a group of roving bobbin support devices (16) for neighbouring spinning positions together are arranged on a mobile storage device (14), which storage devices (14) are movable individually or in pairs, using a transporting device (15) along the machine length and can be deposited using elevator devices (17, 18) provided on the transporting device (15) at a predetermined location, and can be taken up again respectively.

Compl. specn. 14 pages. Drgs. 2 sheets.

CLASS: 172-D<sub>4</sub>.

155570.

Int. Cl. D 01 h 15/00.

A METHOD FOR PREPARING A KNOTLESS JOINT AT A TERMINAL PORTION OF A TEXTILE YARN AND A DEVICE FOR CARRYING OUT THIS METHOD.

Applicant: FOMENTO DE INVERSIONES INDUSTRIALES S. A., OF RAMBLA DE CANALETAS 140, BARCELONA 2, SPAIN.

Inventors: 1. GUY NEGATY-HINDI, 2. CARLOS PUJOL, 3. ERWIN ZURCHER.

Application No. 1300/Cal/81 filed November 21, 1981.

Appropriate office for opposition proceedings (Rule 4. Patents Rules, 1972) Patent Office, Calcutta.

# 8 claims

Method of preparing a knotless joint at a terminal portion of yarn of textile fibres in order to splice two terminal portions or to start an open-end spinning operation according to which said terminal portion is unravelled by gripping one of its ends whereas the other end is submitted to the acrodynamic action of a gaseous flow directed opposite to the gripped end, by closely iuxtaposing a vibratable member with said terminal portion, by exciting said vibratable member to impart transverse oscillations to said terminal portion loosening the non-gripped fibres thereof and by sweeping along these non-gripped fibres of said terminal portion with said gaseous flow.

Compl. specn. 20 pages. Drgs. 2 sheets.

CLASS: 131-B3 & C.

155571.

Int. Cl. G 01 v 3/00, 7/00.

SEISMIC EXPLORATION INSTALLATION.

Applicant: SCHLUMBERGER LIMITED, OF 277 PARK AVENUE, NEW YORK, N. Y. 10172, UNITED STATES OF AMERICA.

Inventors: 1. BRONISLAW SEEMAN, 2. LEON HOROWICZ.

Application No. 1333/dal/81 filed November 26, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

### 5 claims

Seismic exploration installation comprising an acoustic wave detector and means for moving this detector in a well, an acoustic way, source, means for recording the signals produced by detector, said signals comprising downgoing wave components and ipgoing wave components, and means for filtering these signals in order to improve the signal/noise ratio, characterized by the fact that the filtering means include:

- a memory containint the N signals to be processed and controlled to furnish a series of n signals Sl..S<sub>k</sub>....
   S<sub>n</sub>, corresponding to successive levels xl....x<sub>k</sub>....x<sub>n</sub>
- a memory containing the propagation times  $t_k$  of the acoustic waves form the level xl to each level  $x_1$ ;
- a first circuit for advancing the signals s<sub>k</sub>; respectively
   by the time t<sub>k</sub> in relation to the signal s<sub>1</sub>;
- a first adder furnishing the sum z<sub>1</sub> of the signal sl and of the signals s<sub>k</sub> thus advanced;
- a second shift circuit for delaying the signals s<sub>1</sub>; respectivel / by the time t<sub>1</sub> in relation to the signal sl;
- a second adder furnishing the sumSI of the signal sI and of the signals  $\mathbf{s}_k$  thus delayed;
- computation means for determining from the signals yl and zl a signal defined as an optimum estimation of the upgoing wave component for all the signals sl...s.;
- and recording means connected to the computation means.

Compl. sp. cn. 25 pages. Drgs. 10 sheets.

CLASS: 131-Ba.

155572.

Int. Cl. B 27 g 15/00; E 01 g 3/00.

TUNNEL BORING MACHINE.

Applicant · ATLAS COPCO JARVA, INC., OF 29125 HALL STRFET, SOLON, OHIO 44139, U.S.A.

Inventor 1. LARRY LYNN SNYDER.

Application No. 1363/Cal/81 filed December 1, 1981.

Appropriat; office for opposition proceedings (Rule 4, Patents Rule', 1972) Patent Office, Calcutta.

# 10 claims

A tunnel boring machine comprising a plurality of support frame means, holding means on each support frame means cutwardly movable to grip a tunnel wall to fixedly position their associal support frame means in the tunnel, each of said support frame means having a bore therethrough, an elongated, hollow tube extending through each bore and having an a unular piston positioned in each bore said piston and bores constituting fluid pressure chambers to cause relative movement between said hollow tube and said support frame mean drive chaft means rotatably mounted in said hollow shaft and being fixed against longitudinal movement with respect to said piston one end of said drive shaft means extending broomd said plurality of support frame means and driving a rotatable cutter head, and rotatable driving means at the other end of said drive shaft means, each of first ones of said support if frame means including hydraulic means having a pressure mode to force its said holding means against the tunnel wall while supplying fluid to its fluid pressure chamber which drives the rotary cutter head against the tunnel face, each of second ones of said support means including hydraulic means adapted to retract its said holding means from the tunnel wall while exhausting fluid from its pressure chamber to move said second ones of said support means along the hellow tube toward the cutter head while said first ones of sai' support means are in their pressure mode.

Compl. snecn. 19 pages. Drg. 1 sheet.

CLASS: 88-B & D.

155573

Int. Cl. B 01 d 53/00.

IMPROVEMENTS IN A PROCESS FOR THE SEPARATION OF CARBONDIOXIDE AND HYDROGEN SULFIDE

FROM A RAW GASEOUS MIXTURE TO PRODUC**B** A PURIFIED GASEOUS MIXTURE.

Applicant: LINDE AKTIENGESELI SCHAFT, ABRAHAM-LINCOLN STRASSE 21 D-6200 WIESBADEN, FEDERAL REPUBLIC OF GERMANY.

Inventors: 1. DR ZELLER RAINER, 2. DR. BELLONI ALDO, 3. DR. HEISFL MICHAEL.

Application No. 1389 'Cal 81 filed December 5, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

### 8 claims

In a process for the separation of at least carbon-dioxide and hydrogen sulfide from a raw gaseous mixture such as hereindescribed to produce a nuified gaseous mixture comprising passing said gas through a sour gas removal system including the steps of scrubbing said gaseous mixture with a liquid scrubbing agent having a higher affinity for hydrogen sulfide than for carbon dioxide, removing from said system an off-gas enriched in hydrogen sulfide, and passing said offgas to a sulphur recovery system comprising the conversion of sulfur and the recovery system comprising the conversion of sulfur and the recovery system comprising the conversion of sulfur and the recovery system comprising the conversion of sulfur and the recovery system comprising the conversion of sulfur dioxide to hydrogen typical gas to convert sulfur dioxide to hydrogen sulfide and recycling resultant hydrogenated toil gas to said sour gas temoval system whereby essentially no hydrogen sulfide or sulfur dioxide is discharged into the environment.

Compl. specn. 21 pages. Drgs. 2 sheets.

CLASS: 101-E.

155574.

Int. Cl. G 01 p 5/08,

APPARATUS FOR MEASURING THE FLOW OF FLUID IN A WELL,

Additiont · SCHLUMBERGER LIMITED OF 277 PARK AVENUE NEW YORK, N. Y. 10172, UNITED STATES OF AMERICA.

Inventors: 1 JEAN.PIFRRF HULIN. 2. CLAUDE FIERFORT, 3. ROGER COUDOL.

Application No. 1429/Cal/81 filed December 18, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 14 claims

A device for measuring the flowrate of fluid through a well, comprising an upper portion adapted for connection with a cable, two elongated side members, cenerally parallel to and spaced from each other, secured to the upper portion, a vortex generating assembly comprising at least one obstacle secured between said side members transversely of their longitudinal direction, said side members transversely of their the region of said assembly, facing walls which are substantially planar, and a transducer recognise to the occurrence of vortices generated by said as erably, said transducer producing a signal indicative of said flowrate.

(Comp! speci 15 pages. Drgs. 2 sheets.

CLASS: 167-L.

155575.

Int. C1 B 01 j 100; 2/00.

PROCESS AND APPARATUS FOR PRODUCING FIBROITS, AND A GRANULAR MATERIAL FROM HOUSEHOLD AGRICULTURAL, AND FORESTRY WASTE OF THE MANUFACTURING AND OR SERVICE INDUSTRIES.

Applicant: ORFA A.G. OF 7F1 GMATTSTRASSE 12,-CH-8956 KILLWANGEN SWITTFRLAND.

Inventors: 1 1082F FREI, 2. HANS SCHWERI, 3. RUDOLF SCHNORF.

Application No 1456/Cal/81 filed December 24, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

14 claims

A process for producing a fibrous material and a granular material from household, agricultural and forestry waste as well as waste of the manufacturing and/or service industries, containing organic and inorganic partion, comprising prereducing mechanically as hereindescribed the waste to be processed, dividing as herein described the such-pre-reduced waste into at least two fractions by specific weight, the two fractions being:

- (a) a specific light weight fraction, and
- (b) a specific heavy weight fraction,

separately reducing each fraction mechanically as hereindescribed, reuniting the such treated fractions, subsequently drying as herein described the re-united fractions to a specific maximum residual moisture content of 15% per weight and sterilizing them at the same time by heating and extraction as herein described of the resultant steam, and dividing the such treated and re-united material into at least two fractions by specific weight.

Compl. specn. 21 pages. Drg. 1 sheet.

CLASS: 35-E.

155576.

Int. Cl. B 28 b 1/04.

METHOD FOR THE MANUFACTURE OF BASIC REFRACTORY RAMMING MASS, FETTLING MASS OR PATCHING MASS.

Applicant: ORISSA CEMENT LIMITED, RÀJGANG-PUR-770017, DIST.-SUNDARGARH, ORISSA, INDIA.

Inventors: 1. DR. SHYAM LAXMAN KOLHATJAR, 2. TAPAN MUKHOPADHYAY.

Application No. 1464/Cal/81 filed December at 1981.

Appropriate office for opposition proceedings (Rule 4, ratents Rules, 1972) Patent Office, Calcutta.

# 5 claims

A method for the manufacture of basic refractory ramming mass, fettling research, problem mass suitable for the repair and construction of the manufacture of the research of the manufacture of the research of the research

- (a) preparing a first mixture of basic refractory composition consisting of dead burnt magnesite and sodium chromate.
- (b) preparing a second mixture comprising dead burnt magnesite of coarser grain size than the grain size of dead burnt magnewite in the first mixture and sulphuric acid, wherein the said coarser grain size magnesite in the second mixture is mixed with sulphuric acid so that the particles of the coarser grain size magnesite are coated with sulphuric acid,
- (c) adding a portion of the first mixture to the second mixture so that the particles of the second mixture are uniformly bonded and coated with the particles of the first mixture,
- (d) adding remaining portion of the first mixture to the blend of step (c), wherein
- (e) the first mixture (i.e. the fine grain size mixture) is used in an amount of 25 to 50% by wt. of the total mixture.
- (f) sodium chromate is added in an amount of 0.2 to 2% by wt. of the final composition, and
- (g) sulphuric acid is added in an amount of 0.5 to 2.5% by wt. of the final composition, and if desired,
- (h) adding boric acid and/or bentonite as additives to the blend of step (d) with the addition of water.

Compl. specn. 8 pages. Drgs. nil.

CLASS: 69-A.

155577.

Int. Cl. H 01 h 25/00

ELECTRICAL INTERCONNECTION APPARATUS.

Applicant: WESTINGHOUSE ELECTRIC CORPORATION OF WESTINGHOUSE BUILDING, GATEWAY CENTER, PITTSBURGH, PENNSYLVANIA 15222, UNITED STATES OF AMERICA.

Inventor: 1. STANISLAW ADAM MILLIANOWICZ.

Application No. 32/Cal/82 filed January 7, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

### 11 claims

An electrical interconnection apparatus comprising: circuit interrupter means in which separable contacts are provided, one of the said contacts being interconnected with an external terminal, said terminal being a stem having a predetermined cross sectional shape, an external conductor connected to said external stem, said conductor having a substantially flat planar portion with an opening therein which is of the same cross-sectional shape as said stem which is of the same cross-sectional shape as said stem but slightly smaller in cross sectional area, said periphery of said opening having a slit therein which provides a peripherlatab which is offset from the plane of said flat planar surface when said opening is initially disposed around said stem to thus initially accommodate for the difference in area; and compression means cooperating with said external conductor means and said terminal to cause the material of said conductor to flow in the region of said interface between said external conductor means and said terminal when the force of compression is applied with a substantial component normal to the plane of flow.

Compl. specn. 25 pages. Drgs. 14 sheets.

CLASS: 147-C & E.

155578.

Int. Cl. G 11 b 11/00.

TAPE CASSETTE LOADED WITH RESPECT TO A RECORDING AND/OR REPRODUCING APPARATUS.

Applicant: VICTOR COMPANY OF JAPAN LTD. NO. 12, 3-CHOME, MORIYA-CHO, KANAGAWA-KU, YOKO-HAMA-SHI, KANAGAWA-KEN, JAPAN.

Inventors: 1. HARUKI OGATA, 2. KIMIO OGAWA, 3. HOROYUKI UMEDA.

Application No. 86/Cal/82 filed January 21, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta,

# 10 claims

A tape cassette loaded with respect to a recording and/or reproducing apparatus having a reel driving mechanism including at least one reel driving shaft, said tape cassettee comprising:

a cassette case:

a supply side reel and a take-up side reel provided within said cassette case, for winding a tape; and

positioning means for positioning said cassette case.

one reel of said supply side and take-up side reels being constructed so that the reel driving shaft of said recording and/or reproducing apparatus is inserted into said one reel from a lower irrection thereof to engage therewith when said tape cassette is loaded into said recording and/or reproducing apparatus, and driven at a center part of said one reel.

the other reel of said supply side and take-up side reels being constructed so as to be rotated by a rotation transmitting mechanism at a part other than a center part thereof,

said positioning means having an engaging part of positioning provided on the bottom surface of said cassette case at a position corresponding to the center of rotation of said other reel.

Compl. specn. 58 pages. Drgs. 11 sheets,

CLASS: 85-J & R.

155579.

Int. Cl. C 21 b 7/10; F 27 b 1/24.

SHAFT-FURNACE WALL COOLING ARRANGEMENT.

Applicants: (1) GOSUDARSTVENNY SOJUZNY INSTITUT PO PROEKTIROVANIJU METALLURGICHESKIK ZAVODOV, OF PROSPEKT MIRA, 101, MOSCOW, USSR; AND (2) VSESOJUZNY NAUCHNO-ISSLEDOVATELSKY I PROEKTNY INSTITUT PO OCHISTKE TEKHNOLOGICHESKIKH GAZOV, STOCHNYKH VOD I ISPOLZOVANIJU VTORICHNYKH ENERGORESURSOV PREDPRIYATY VHERNOI METALLURGII "VNIPICHERMETENERGOOCHISTKA" OF KHARKOV, PROSPEKT LENINA 9 LISSR LENINA, 9, USSR.

Inventors: 1. LEV DMITRIEVICH GRITSUK, 2. ANATOLY STEPANOVICH GORBIK, 3. KAZIMIR DOMINI-KOVICH BASHINSKY, 4. DORINA BORISOVNA KUT-SYKOVICH, 5. JURY IVANOVICH TSELLJIKO, 6. ALEXANDR EFIMOVICH SUKHORUKOV, 7. IGOR MIKHALLOVICH PEFTIEV, 8. VIKTOR PETROVICH BOGADITSA DITSA.

Application No. 213/Cal/82 filed February 24, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 3 claims

A shaft-furnace wall cooling arrangement comprising longitudinal cooling members made in the form of pipes arranged along the furnace wall, and supporting cooled projections with sleeves fixed on the pipes of said longitudinal cooled members, the pipes of said supporting cooled projections extending between the pipes of the longitudinal cooling members and arranged relative to the pipes of the longitudinal members so that an angle equal to or less than 30° is formed there-

Compl. specn. 10 pages. Drgs. 2 sheets.

CLASS 150-F.

155580.

Int. CI. F 16 1 21/02, 21/04.

PIPE JOINT FOR PREVENTING SEPARATION.

Applicant: KUBOTA, LTD., OF 2-47, SHIKITSUHI GASHI 1-CHOME, NANIWA-KU, OSAKA, JAPAN.

Inventors: 1. TADAO YAMAJI, 2. TOSHI NAKAJIMA, 3. TAKESHI KASHI.

Application No. 478/Cal/82 filed April, 29, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta,

# 8 claims

A pipe joint for preventing separation between a socket and a spigot, an annular packing being provided between a packa spigot, an animar packing being provided between a packing seat formed on the inner periphery of the socket and the outer periphery of a spigot, the pipe joint comprising a holding member, such as a pressing ing or housing connectable to an annular outer flange formed at the end of the socket and surrounding the spigot outer periphery outside the socket, the holding member being annolar or being adapted to form an annular shape, the holding member being provided on its inner periphery with a tapered surface having an increasing diameter toward the socket; stopper means interposed between the inner periphery tapered surface of the holding member and the spigot outer periphery and having engaging edge means in a plurality of circumferential rows to engage the spigot outer periphery and too holts eventing the spigot. the spigot outer periphery; and tap bolts extending through the holding member at suitable portions along its circum-ference for pressing the stopper means from outside against the spigot outer periphery; characterised in that (a) the stopper means is provided in the form of a ring divided at one portion and provided with a circumferentially continuous outer peripheral tapered surface having an increasing diameter toward the socket, and (b) each of the tap bolts has a forward end in face-to-face wedging contact with the outer peripheral tapered surfaces of the stopper ring.

Compl. specn. 14 pages. Drgs. 6 sheets.

CLASS: 64-B3 & B2.

155581.

Int. Cl. H 02 g 15/00.

A TERMINAL DISTRIBUTION BOX.

Applicant: SIEMENS AKTIENGESELLSCHAFT OF BER-LIN AND MUNICH WEST GERMANY.

Inventors: 1. KLAUS DUSSEL, 2. GERHARD OTT.

Application No. 572/Cal/82 filed May 20, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 5 claims

A terminal distribution box for distributing the ends of individual plastics-insulated electrical lines which make-up a multiware power cable or cable with shielded wires intended to operate at a voltage in excess of 15 kv, said box comprising an insulating housing through which said cable extends and which distributes the ends of the lines, and each of said lines and the lines and each of said lines. ends being covered with a respective shrink-on sleeve which fits over an insulating body arranged over the line end in the region of the point of removal of an outer conductive layer of the line end:

in which the insulating housing comprises a shrink-on moulded component, and each insulating body comprises a flexible, push-on terminating body which incorporates a deflector to engage the corresponding line end in the region of the point of removal of the outer conductive layer from the line end.

Compl. specn. 6 pages. Drg. 1 sheet.

CLASS: 98-E.

155582.

Int. Cl. F 28 d 19/00; F 28 f 5/02.

A ROTARY REGENERATIVE HEAT EXCHANGE APPARATUS.

Applicame. THE AIR PREHEATER COMPANY, INC. OF ANDOVER ROAD, WELLSVILLE, NEW YORK, UNITED STATES OF AMERICA.

Inventor: 1. RICHARD FRANKLIN STOCKMAN.

Application No. 574/Cal/82 filed May 20, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 5 claims

A rotary regenerative heat exchange apparatus having a rotor including an upright rotor post and a concentric rotor shell spaced therefrom to provide an annular space therebetween, a mass of heat absorbent material carried in the annular space between the rotor post and the rotor shell, a housing surrounding the rotor in spaced relation thereto, spaced ducts at opposite ends of the rotor adapted to provide inlet and outlet ducts for a heating fluid and for a fluid to be heated, a support bearing supporting the rotor post for rotation of the rotor post and concentric rotor shell about its vertical axis, eans for rotating the rotor about its vertical axis, a support column adapted to carry the support bearing, and a plurality of support pedestals subjacent the housing, said support pedestals for the housing being structurally independent from the support column for the rotor whereby the rotor housing will effect a compressive force upon each pedestal independent from the compressive force of the rotor upon the support column thereby precluding sympathetic movement therebetween.

Compl. specn. 9 pages, Drg. 1 sheet.

CLASS: :167C & 168-C.

155583.

Int. Cl. B07c 5/10; 5/24.

APPARATUS FOR MEASURING SURFACE COLOUR OF AN ARTICLE SUCH AS FRUIT.

Applicant : SUNKIST GROWERS, INC. OF 720 EAST SUNKIST STREET, ONTARIO, CALIFORNIA, UNITED STATES OF AMERICA.

Inventors: TIM DENNIS CONWAY & PAUL FRANK PADDOCK.

Application No. 1042/Cal/82 filed September 8, 1982.

Divisional of application No. 486/Cal, 79 filed 10th May,

Appropriate office for opposition procedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

### 9 claims

Apparatus for measuring the surface color of an article such as fruit, characterized in that said apparatus comprises an examining region; a source of illumination for illuminating the surface with light having components within both a first and a second band of wavelengths; a sensor for sensing light-reflected from a plurality of unit areas on the surface of the article and producing for each, of said areas a first measurement proportional to the intensity of reflected light within said first band of wavelengths, and a second measurement proportional to the intensity of reflected light within said second band of wavelengths; a first comparator for comparing each of said first measurements with the corresponding one of said second measurements, thereby producing a plurality of characteristic color signals for the article; a second comparator for comparing each of said characteristic color signals to a predetermined threshold and producing color count pulses in accordance with the results of the comparisons; and a counter for counting the number of color count pulses, thereby producing a measure of the amount of surface having a prescribed color; and optional when desired, having at least one of (a) a normality is as herein defined, (b) a transport as herein defined.

Compl. specn. 50 pages. Drgs. 11 sheets.

CLASS: 167-C & 168-C.

155584.

Int. Cl. B07c 5/0; 5/34.

APPARATUS FOR MEASURING THE SIZE OF THE SURFACE OF AN ARTICLE SUCH AS FRUIT.

Applicant: SUNKIST GROWERS, INC. OF 720 EAST SUNKIST STREET, ONTARIO, CALIFORNIA, UNITED STATES OF AMERICA.

Inventors: TIM DENNIS CONWAY & PAUL FRANK PADDOCK.

Application No. 1043/Cal/82 filed September 8, 1982.

Division of Application No. 486/Cal/1979 filed 10th May 1979.

Appropriate office for opposition procedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 8 claims

Apparatus for measuring the size of the surface of an articles such as fruit, characterized in that said apparatus comprising: an examining region; illuminators operable when the articles is disposed in said examining region for illuminating the surface of the articles. Sensors for sensing light reflected from the surface and producing a plurality of light intensity measurements, each of said measurements corresponding to the intensity of light reflected from a discrete segmental area on the surface, each of said segmental areas having substantially the same predetermined size; and a receiver for receiving the plurality of light intensity measurements and counting the number of segmental areas on the surface, thereby producing a measure of the size of the surface, and optionally, when desired, having at least one of (a) a transport such as herein defined, (b) a sorter such as herein defined, or (c) a scanner and an adder such as herein defined.

Compl. specn. 48 pages. Drgs. 11 sheets.

CLASS: 167-C & 168C. Int. Cl. B07c5/10; 5/34.

APPARATUS FOR DETECTING AND MFASURING BLEMISHES ON THE SURFACE OF AN ARTICLE".

Applicant: SUNKIST GROWERS, INC. OF 720 EAST SUNKIST STREET, ONTARIO, CALIFORNIA, UNITED STATES OF AMERICA.

Inventors: TIN DENNIS CONWAY & PAUL FRANK PADDOCK.

Application No. 1451/Cal/82 filed December 16, 1982.

Division of Application No. 486/Cal/1979 filed 10th May, 1979.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

### 2 claims

Apparatus for detecting blemishes on the surface of an article as herein described characterised in that said apparatus comprising an apparatus defining a substantially planar examining region; a transporter for moving the article through said examining region, a source of illumination operable when the article is disposed in the examining region for illuminating the surface of the article whereby light is reflected from blemished and unblemished portions of the surface to defferent degrees: a camera for sensing light reflected from the surface of the article said camera including a plurality of phototransducers arranged in a co-planar relationship on the periphery of said examining region and adapted to sense light reflected from the portion of the surface of the article that intersects the examining region, said portion being a circumferential swath on the surface of the article; a reader for reading the outputs of said plurality of phototransducers in a sequential and repetitive fashion, thereby forming a sequence of light intensity measurements, each of said reasurement corresponding to the intensity of light reflected from a discreate segmenal area on the surface of the article and means for processing the sequence of light intensity measurements to produce a measure of blemishes on the surface of the article.

Compl. Specn. 48 pages. Drgs. 11 sheets.

CLASS:  $157-D_{o}(c)$ .

155586.

Int. Cl. E 01 b 9/60.

A RAILWAY RAIL-FASTENING CLIP.

Applicant: PANDROL LIMITED, OF 9 HOLBORN, LONDON EC 1N 2NE, ENGLAND.

Inventor: 1. TREVOR PAUL BROWN.

Application No. 513/Del/1980 filed July 14, 1980.

Division of Application No. 102/Cal/77 dated 25th January, 1977.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 6 claims

A railway rail-fastening clip comprising a bar of resilient metal which has been bent so as to have, progressing from one end of the bar to the other, a first portion which constitudes a substantially straight leg, then a second portion in the form of a reverse-bend, then a third portion extending generally in the direction of said one end, then a fourth portion which extends from the third portion, generally to that side thereof upon which said leg is disposed and constitutes a second reverse-pend, and finally a fifth portion extending in the general direction toward the junction between the first and second portion, the lfth portion having a flat surface on one side thereof, which flat surface extends to said other end of the bar, the configuration of the clip being such that it is possible so to place the clip that it is free from stress, its first portion is horizontal and said flat surface is horizontal and when the clip is viewed in plan the third and fifth portions appear to be on opposite sides of said first portion.

Compl. specn. 10 pages. Drgs. 2 sheets.

CLASS 55E4 & 60X2b.

155587.

Int. Cl. A61; 3/06.

PROCESS FOR PREPARATION OF SIMETHICONE ANTACID LOZENGE".

Applicant & Inventor: ARUN KRISHNA MITRA, OF 31, KENTON DRIVE, ST. LOUIS, MO 63132, U.S.A.

Application No. 1197/Cal/82 filed October 14, 1982.

Appropriate office for opposition procedings (Rule 4, Paten's Rules, 1972) Patent Office, Calcutta.

### 9 claims

A process for manufacture of a lozenge containing antacid and sim-thicone, the process comprising the steps;

- (a) cooking a candy base,
- (b) mixing a cooked molten candy composition, and
- (c) forming a hard candy lozenge

wherein antacid is placed into the candy base during or prior to the cooking step, and simethicone is placed into the candy base prior to cooking or into the cooked molten candy composition during or prior to mixing.

Compl. specn. 17 pages. Drgs. nil.

CLASS:  $32F_1(b)$ ;  $55D_2$ .

155588.

Int. Class: C07c 119/00.

"PROCESS FOR THE PREPARATION OF SALTS OF THIAZOLYI IDENE-OKO-PROPIONITRILES".

Applicant: SCHERING AKTIENGESELLSCHAFT A BODY CORPORATE ORGANISED ACCORDING TO THE LAWS OF THE FEDERAL REPUBLIC OF GERMANY, OF BERLIN AND BERGKAMEN, FEDERAL REPUBLIC OF GERMANY.

Inventors . REINHOLD PUTTNER, ULRICH BUHMANN AND HAR1 MUT JOPPIEN.

Application for Patent No. 358/Del/80 filed on 15th May, 1980.

Appropriate office for opposition procedings (Rule 4, Patents Rule, 1972) Patent Office Branch, New Delhi-110005.

# 4 claims

A process for the preparation of salts of thiazolydiene-oxopropronitriles of the general formula I

in which  $R_1$  represents a hydrogen atom, a halogen atom, a  $C_1$ — $C_0$ —alkyl group, a  $C_3$ — $C_6$ —cycloalkyl group, a thienyl group, or a pyridyl group, an unsubstituted phenyl group or a phepyl group substituted by one or more substituents selected from  $C_1$ — $C_4$ — alkyl groups,  $C_2$ — $C_4$ — alkoxy groups, halogen atoms, trifluoromethyl groups, nitro groups, and cyano groups.

 $R_2$  represents a hydrogen atom, a halogen atom, a  $C_1$ — $C_6$ —alkyl group, a  $C_3$ — $C_6$ —cycloalkyl group, a thienyl group, a byridyl group, an unsubstituted phenyl group or a phenyl group substituted by one or more substituents selected from  $C_1$ — $C_4$ —alkoxy groups, halogen, atoms, trifluoromethyl groups, nitro groups and cyano groups,

 $R_3$  represents a hydrogen or halogen atom or a trifluoromethyl,  $C_1$ — $C_4$ —alkyl,  $C_-$ — $C_4$ haloalkyl,  $C_1$ —Cualkoxy,  $C_1$ — $C_4$ —alkylthio nitro or cyano group,  $R_4$  represents a hydrogen or halogen atom or a trifluoromethyl,  $C_1$ — $C_4$ —alkyl,  $C_1$ — $C_4$ —haloalkyl,  $C_1$ — $C_4$ —alkoxy,  $C_1$ — $C_4$ —alkylthio, nitro or cyano group, and

B—represents an ammonium group comprising reacting a compound of the general formula III

wherein  $R_1$ ,  $R_2$ ,  $R_3$  and  $R_4$  have the meanings given above, with ammonia or an amine.

Compl. specn. 26 pages. Drawing 1 sheet.

CLASS: 32F2b, 55E4.

155589.

Int. Class: C07d 43/20.

"AN IMPROVED PROCESS FOR THE PRODUCTION OF ERGOTAMINE FROM ERGOT".

Applicant: CUNCIL OF SCIENTIFIC AND INDUST-RIAL RESEARCH, RALL MARG, NEW DELHI-110001, INDIA, AN INDIAN REGISTERED BODY INCURPORAT-ED UNDER THE REGISTRATION OF SOCIETIES ACT (ACT XXI OF 1860).

Inventors: VISHWAPAUL AND SRI NIWAS GARG. Application for Patent No 123. Del/1981 filed on 6th March, 1981.

Complete specification left on 5th June, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rule, 1972) Patent Office Branch, New Delhi-110005.

# 3 claims

An improved process for the production of ergotamine from ergot compusing extracting powdered fresh ergot with a solvent admixture of ethyl acetate and aq. ammonia to recover total alkaloids and oil, treating, the extract containing total alkaloids and oil with aq tattafic acid to separate the oil and obtain total alkaloids in tattafic acid layer, basifying and ext action thereof with ethyl acetate, concentrating the extract in vacuo and separating ergotamine from the total alkaloid concentrate by chromatography.

Provisional specification 5 pages.

Compl. specn. 8 pages

CLASS: 15 D.

155590.

Int. Class: F16c 35/00.

"CONICAL BEARING CAGE'.

Applicant: FEDERAL-MOGUL CORPORATION, A CORPORATION ORGANIZED UNDER THE LAWS OF THE STATE OF MICHIGAN, U.S.A., OF 26555 NORTH-WESTERN HIGHWAY SOUTHFIELD, MICHIGAN 48034, UNITED STATES OF AMERICA.

Inventor: ROBERT MELVIN RYANEN.

Application for Patent No. 138/Del, 81 filed on 12th March, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Orlice Branch, New Delhi-5.

# 12 claims

A Conical bearing cage for a tapered assembly comprising: an integral member having a conical central axis and including; a first large circular ring having an inner circumferencial

surface and an outer circumferencial surface connected by inner and outer faces, a second small circular ring having an inner circumferencial surface and an outer circumferencial surface connected by inner and outer faces, the second ring being of smaller radius than the first ring a plurality of circumferencially spaced bridges inter-connecing said rings, each of said bridges having top and bottom surfaces interconnected by spaced sides, said sides of each of said bridges having a tapered portion extending inwardly from said top surface thereof for defining lips at the intersection of each side and associated top surface, characterized by a rib on said top surface of each bridge extending from one side ring to the other, and said lips being disposed radially inwardly of the top surface of each said rib at the juncture threof with said large circular ring and diverging to a common radial juncture therewith approximately at said small circular ring.

Compl special pages. Drg. 1 sheet.

CLASS: -95 18. 5A.

155591.

Int. Class: AU1b35/80, E02 f 3/00.

"AN EXCAVATING TOOTH".

Applicant: ESCO CORPORATION, AN ORGAN CORPORATION, LOCATED AT 2141 NORTHWEST 25TH, AVENUE, PORTLAND, OREGON 97210, UNITED STATES OF AMERICA.

Inventors: FREDERICK CHARLES HAHN, WILLIAM RICHMOND BARBER AND DAVID ALFRED HAMPEL.

Application for Patent No. 142/Del/1981 filed on 13th March, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office Branch, New Delhi-5.

# 15 claims

An excavating tooth comprising an adapter element and a point element, said adapter element having means at one end for connection to a bucket or the like and means at the other end for coupling to said point element, said point element having an earth engaging edge at one ed constituting the tooth forward end and means at the other end for coupling to said adapter element, said coupling means including a nose on one element and a rose receiving socket on the other element, a plurality of co-operating generally helical thread means on said nose and in said socket whereby said point element is rotated about a longitudinal axis to install the same on said adapter element, and lock means externally of said nose releasably connecting said element to prevent reverse rotation of said point element when the same is installed on the said adapter element.

Compl. specn. 21 pages. Drawings 3 sheets.

CLASS: 176 F.

155592.

Int. Class: P22b 21/00, F23d 19/00.

"A VERTICAL WATER TUBE BOILER".

Applicant: SARASWATI INDUSTRIAL SYNDICATE LTD.. YAMUNA NAGAR-135001, HARYANA, INDIA, AN INDIAN COMPANY.

Inventor: PERINGANDUR KRISHNAN HARIHARAN. Application for Patent No. 146/Del/81 filed on 17th March, 1981.

Appropriate office for opposition proceedings (Rule 4 Patents Rules, 1972) Patent Office Branch, New Delhi-5.

# 13 claims

A vertical water tube boiler comprising a hood, a barrel and a casing joined together, a tube plate secured to the barrel, a central down comer neader pipe and a plurality of boller tubes secured to the tube plate and extending downwardly therefrom, an inner feed pipe within the down comer header pipe extending downwardly from the hood and a bed plate for a fluidized bed of coal or other solid fuel, fitted with a plurality of nozzles for the combustion air, at the lower end of the casing and a wind box or air chamber below the said bed plate, for receiving and supplying combustion air to the fluidised bed.

Compl. speen. 10 pages. Drawing 1 sheet.

CLASS: 47C.

155593.

Int. Class: F23b 1/00.

'IMPROVEMENTS IN OR RELATING TO NATURAL CIRCULATION WATER TUBE BOILERS HAVING BED PLATES FOR FLUIDISED BED FOR COMBUSTION OF COAL AND LIKE FUELS".

Applicant: SARASWATI INDUSTRIAL SYNDICATE LTD., OF YAMUNA NAGAR-135 001, HARYANA, INDIA, AN INDIAN COMPANY.

Inventor: PERINGANDUR KRISHNAN HARIHARAN.

Application for Patent No. 147/Del/81 filed on 17th March, 4981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office Branch, New Delhi-5.

# 13 claims

A natural circulation water tube boiler comprising a bed plate having a plurality of tubes having fins on opposite sides, arranged horizontally and in parallel, the fins having holes for passage of combustion air and means for supplying combustion air through the said holes and in which the said tubes are connected to a water header or distribution manifold on one side and are bent and extended upwardly on the other side forming wall tubes of furnace constituted by fluidised bed of coal or other solid fuel on the bed plate.

Compl. specn. 14 pages. Drgs. 2 sheets.

CLASS: 80 F.

155594.

Int. Class: B01d 33/00.

"DRAINAGE DECK ASSEMBLY FOR ROTARY VACUUM DRUM FILTER".

Applicant: DORR OLIVER INCORPORATED. OF 77 HAVEMEYER LANE, STAMFORD, CONNECTICUT 06904, UNITED STATES OF AMERICA, A CORPORATION ORGANISED UNDER THE LAWS OF THE STATE OF DELAWAREM, UNITED STATES OF AMERICA, ENGINEERS.

Inventors: PAUL ARTHUR BROWNE & ROBERT WILLIAM MORTON.

Application for Patent No. 149/Del/81 filed on 17th March, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office Branch, New Delhi-5.

# 9 claims

A drainage deck assembly for a rotary vacuum drum filter having a drum mounted for rotation in an ascending and descending path into and out of a slurry tank, said drainage deck assembly comprising:

- (a) a plurality of divider members extending longitudinally of the Central axis of said drum and mounted in spaced and parallel relationship about the outer surface of said drum,
- (b) at least one rectangular shaped drainage grid section mounted between each pair of divider members to provide filtrate compartments there between about the circumference of said drum.
- (c) openings provided in the outer surface of said drum in each of said filtrate compartments for receiving filtrate for discharge from said filter.
- (d) interlocking means on the trailing and leading ends of each grid section for securing said grid section to said pair of dividers.
- (e) a filter media located about the drum and spaced from the outer surface thereof by said grid sections,
- (f) a plurality of spaced and parallel rows of filtrate receptacle trays provided in the surface of each of said grid sections to receive filtrate from said filter media when a vacuum is applied to said drainage grid section in the ascending path of the drum.
- (g) a plurality of baffle walls depending from each grid section to engage said drum surface and to provide

a filtrate channel in raid filtrate compartment leading to said discharge opening for each row of said plu ality of rows of filtrate receptacles,

- (h) said filtrate receptacle trays each having a bottom wa'l surface spaced from said filter mcd'a by the sid walls of the tray, and
- (i) a filtrate discharge slot formed in the bottom wall of each of said filthers trops at a predetermined location at the end of said tray closet to the trailing up ar the end of and tray closet to the trailing end of the grid section to permit flow of filtrate into its associated filtrate channel in said filtrate compartment during the ascending path of said drum of to present flowback of filtrate through said slot when said vacuum is interrupted in the descending path of the drum.

(Compl. specn. 15 pages. Drawings 3 sheets.

CLASS: 40-B.

155595.

Int. Class: B01 j-11/00.

Title: "A METHOD FOR PREPARING CATELYSTS COMPRISING ALUMINIUM OXIDE AND COPPER OXIDE".

Applicant: NORSK HYDRO AS., A NORWEGIAN COMPANY, OF BYGDY ALLE 2, OSLO 2, NORWAY. Inventor: LEIF ALBERT KRISTIANSEN.

Application for Patent No. 150/Del/81 file on 18th March

Appropriate office for opposition proceedings (Rule 4, Patents Rules 1972) Patent Office Branch, New Delhi-110005.

### 6 claims

A metho i for preparing catalysts comprising aluminium oxide and copper where at least 60 per cent by weight of this oxide mixture consists of a copper oxide, aluminium oxide compound having a spinel structure said method co aprising precipitation of metal salts, filtering drying calcining and tableting, character zed in that a solution of copper and aluminum nitrate is mixed with a solution of ammonium or alkali carbonate du ing edjustment of the pH to 50-6.5 fo this mixtur, and that the suspen on the eby formed containing copper hydroxide and or copper hydroxycarbonate and aluminium hydroxide is filtered, washed and dried and that the dried p oduct is calcined at 750—850°C until it is obtained 60—100% spinel structure, and that a zinc salt then is added to the spinel either as a aquous zinc salt solution or a zinc salt rielt, whereupon the spinel thus impregnated is heated to at least the decomposition temperature for the zinc. salt, whereby this salt is converted to zinc oxide, and that it possibly is added further amounts of zinc oxide which is admixed mechanically.

Compl. pecn. 22 pages.

CLASS: 76 I, C, F

155596

Int. Cl.: F 05 b 53/00.

A REMUTE CONTROL MECHANICAL DEVICE TO LOCK AND UNLOCK CLOSURE MEMBERS SUCH AS WINDOWS, DOORS AND THE LIKE.

Applican: GURVINDER SINGH RUP, OF B-1/480, IANAKPURI, NFW DELHI-110058, INDIA, AN INDIAN NATIONAL.

Inventor: GURVINDER SINGH RUP.

Application for Patent No. 158/Del/81 filed on 20th. March, 1981.

Complete Specification left on 21st June, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rues, 1972) Patent Office Branch, New Delhi-110 005.

# 9 C'aims

A remote control mechanical device for lacking or unlocking a closure member comorising a rotatible member and a slitable member, one of the said members secured to the frame of the closure member and the other member to the closure member, mutually engaging teeth or part of screw thread on the rotatable member and the slidable men ber for moving the slidable member on the rotation of the rotatable member, a receiving member for receiving and holding the slidable member and means connected to the rotatable member for imparing to the rotatable member jotary motion from a remote location.

Provisional specification 4 pages.

Complete specification 8 pages.

Drg. 2 sheets.

CLASS : 175 I

155597

Int Cl.: F 16 t 1/24.

INVERTED PUCKET STEAM TRAP.

Application YWHC, INC., A CORPORATION OF THE STATE OF DI LAWARE, UNITED STATES OF AMERICA, OF 2626 CONCORD PIKE, BOX 7138, WI MINGTON, DELAWARE 19803, UNITED STATES OF AMERICA.

Inventor: RICKY K. WANG.

Application for Patent No. 160/Del/81 filed on 23rd March 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office Branch, New Delhi-110005.

# 20 Claims

An inverted bucket steam trap comprising:

a body having a float chamber:

an inverted bucket movable within said float chamber;

supply means in fluid communication with the interior of and bucket for supplying steam to said bucket causing said bucket to float and for supplying condensate to said float chamber causing said bucket to sink;

Discharge means in fluid communication float chamber through a valve seat for condensate from said float chamber; with said discharging

a value member movable into and out of engagement with said value seat;

and coupling means between said valve member and said bucket for moving said valve member in response to movement of said bucket, said coupling means including a first lever connected to said bucket and mounted for pivotal movement about a first axis and a second lever carrying said valve member and mounted for pivotal movement about a second axis and for translatory movement away from said second axis, said first and second levers coupled together at a point which moves about said

coupled together at a point which moves about said first and second axes.

Complete specification 12 pages.

Drg. 2 sheets.

CLASS: 32 Ft

155598

Int. Cl.: C 07C--69/64.

PROCESS FOR THE SYNTHESIS OF  $\alpha$ -CHLORINATED CHLOROFORMATES.

Applicant: SOCIETE NATIONALE DES POUDRES FF 1 MPI (SIFS, A FRENCH CORPORATION, OF 12 OUA) HI ARI IV 75181 PARIS, CEDEX 04, FRENCH.

Intentor : GUY CAGNON, JEANPIERRE, JONATHAN MARTZ AND MARC PITEAU. THOMAS

Application for Patent No. 271/Del/1981 filed on 1st May, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Petent Office Branch, New Delhi-110 005.

# 14 Claims

Process for the synthesis of a-chlorinated chloroformates of the formula I-A

$$R - \left(\frac{CH - O - C - CL}{H}\right)_{m}$$

in which: R represents a substituted or unsubstituted hydrocarbon radical and m represents an interger superior or equal to one, characterised in that phosgene is reacted with the corresponding aldehyde, R (CHO)<sub>m</sub>, R having the same meaning as above, in the presence of a catalyst of the kind such as herein described.

Complete specn. 32 pages.

Drg. 4 sheets.

CLASS: 87A [XLII(4)]

155599

Int. Cl.: A 63 b 21/14.

PUSH-PULL TYPE PHYSICAL EXERCISING DEVICE.

Applicant: COMPRET NOV., A COMPANY ORGANISED UNDER THE LAWS OF THE NETHERLANDS, OF PAULUS POTTERFSTRAT 12, AMSTERDAM Z1, NETHERLANDS.

Inventor: GERT F. KOLBEL.

Application for Patent No. 305/Del/81 filed on 15th May,

Convention application dated on 4th June, 1980/8018265/(U.K.).

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Parent Office Branch, New Delhi-110 005.

# 6 Claims

A physical exerciser for push and pull exercises comprising an elongate telescopic system, the system being contractable longitudinally by the application of manual pressure, resilent biasing means arranged to resist contraction of the system, a pair of flexible substantially inextensible tension elements on opposite sides of the system connecting the ends of the system so that pulling apart of the tensions elements on opposite sides of the system contracts the system against the biasing means, at least two tension element ends each passing round an associated guide member, characterised by at least two stop means one attached to each of said at least two ends one inwards round its guide member, and by a sevarate unrestrained pull member connected to each such end, such that pulling on a pull member moves the associated tension element around the guidé member to contract the system.

Compl. specn. 8 pages.

Drg. 5 sheets.

**CLASS:** 174 G

155600

Int. Cl.: F 16 f 6/00.

DAMPING DEVICE FOR MAGNETIC CONTROL CIRCUITS.

Applicant: JUAN AGUT SANZ, OF AVDA, CAUDILLO, 317-lo-la, TARRASA, BARCELONA, SPAIN, A SPANISH CITIZEN.

Inventor: JUAN AGUT SANZ.

Application for Patent No. 349/Del/81 filed on 2nd June, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Pules, 1972) Patent Office Branch, New Delhi-110 005.

# 5 Claims

Damping device for magnetic control circuits, characterized in that it comprises a flexible plate disposed between the fixed magnetic circuit of a relay or a contactor and the base of its casing, which plate incorporates means for retaining the magnetic circuit. means for seating the support plates of the coil and means for retaining the flexible plate to the base of the rasing.

Compl. specn 6 pages, Drg. 1 sheet.

CLASS · 24-F & 134-D

155601

Int. Cl : B 60 t 1/00.

VEHICLE DRUM BRAKES.

Applicant LUCAS INDUSTRIES LIMITED, GREAT KING STRFET, BIRMINGHAM-19, ENGLAND.

4-457 GI /84

Inventor: ANTHONY ASQUITH.

Application No. 190/Mas/81 filed October 15, 1981.

Con ention date: November 1, 1980 (U.K. No. 8035189).

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Madras Branch.

### 30 claims

A brake comprising at least one friction member adapted for engagement with a braking surface of a member to be braked, actuating means operable to move the friction member or members into rubbing contact with said braking surface, and adjuster means which automatically moves the friction member or members relative to the actuating means to compensate for wear of the friction member or members, the adjuster means having a plurality of adjustment members which are operated in unision to move the friction member or members relative to the actuating means, each adjustment member having a set of ratchet teeth thereon, and an operating member having thereon an equal plurality of pawls disposed for engagement respectively with the sets of ratchet teeth, the operating member being reciprocable so as to cause the pawls to operate the adjustment members by equal amounts in response to the travel of the actuating means exceeding a predetermined value to apply the friction member or any of the friction members to said braking surface.

Reference to U.S. Patent No. 3891068 has been made.

Compl. specn. 29 pages.

Drg. 6 sheets.

155602

CLASS: 5-A

Int. Cl.: A 01 b 3/00 + 13/00.

AN IMPROVED PLOUGH.

Applicant & Inventor: THIRUVARIAMUTHU PUNA-MALAIMUTHU PALANIKUMARASWAMY ACHARI, MAIN ROAD, THIRUMALAPURAM, THEMPOTHAI VILLAGE, PANPOLI P.O., (VIA) SHENCOTTAI, TENKASI TALUCK, TAMILNADU.

Application No. 216/Mas/81 filed November 26, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Madras Branch.

# 7 Claims

An improved fixed thereto, a male having a share fixed thereto, a mode that a said share, the curved, a yoke bar connected to the an adjusting means for adjusting the height of the yoke bar, said adjusting means comprising a plate having an arcuate opening, said plate being fixed between said hardle and said share, and a fastening means for fixing said yoke bar at any preselected position along said arcuate opening.

Compl. speen. 9 pages.

Drg. 1 sheet.

CLASS: 186-F & 194-C1

155603

Int. Cl. H 04 n 5/00.

A TRANSPARENT PICTURE TUBE SCREEN FOR A COLOUR TV RECEIVER FOR DISPLAYING A THREE-DIMENSIONAL TV IMAGE OF A THREE-DIMENSIONAL THERFON.

Applicant: INDIAN INSTITUTE OF TECHNOLOGY, I.I.T., P.O., MADRAS-600 Q36, TAMIL NADU.

Inventors: (1) KARUPPANA GOUNDER BALASUBRAMONIAN. (2) NATARAJAN NITHIYANANDAM, (3) KANNAZUTHU PUTHANMADAM RAJAPPAN.

Application No. 218/Mas/81 filed November 27, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office. Madras Pranch.

# 3 Claims

A transparent picture tube screen for a colour TV receiver for displaying a three dimensional TV image of a three-dimensional object thereon, the said screen having vertical microstrips coated with monochrome phosphor material, the

AND THE PROPERTY OF THE PROPER microstrips being disposed at three different planes so as to display the images corresponding to three video signals at

three different depths and thus enable a three-dimensional image of the object to be visually reconstructed thereon, the said video signals being produced and transmitted by means of three identical monochrome TV carrers disposed advected to each other, the focal planes of the cameras being advant to respectively pass through the rear, the middle and the front regions of the object; it moving the blurred or out of focus regions and reconverting into video signals in analog form, before transmitting the said video signals on frequency division multiples basis to the said colour TV receiver in the known way, the said video signals being capable of projection from three electron guns of the said receiver on to the said screen through a she low aperture mask.

Compl. specn. 6 pages

Drg. 1 sheet.

CLASS: 24-E & 134-D

155604

Int. C1: B 60 t 1/00 & F 16 d 66/00.

AUTOMATIC ADJUSTER FOR A SHOE DRUM BRAKE AND SHOF DRUM BRAKE INCORPORATING THE SAME.

Applicant: LUCAS INDUSTRIES LIMITED, GRFAT KING STREFT, BIRMINGHAM B 19 2XF, ENGLAND.

Inventors: (1) CHRISTOPHER (2) RONALD MICHAFL HUGHES. WILLIAM PALMER,

Application No 223/Mas/81 filed December 4, 1981.

Convention dates: December 6, 1980 (U.K. No. 8039220),

June 4, 1981 (U.K. No. 8117121).

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Madras Branch.

# 16 Claims

An automatic adjuster for a shoe drum brake comprises a device of automatically variable length operable, in use in response to wear of the brake shoe linings, to maintain a predetermined maximum shoe to drum clearance, and a thermally responsive body of share memory effect (SME) material (as hereinbefore defined) acting, at least during brake actuation, in response to an increase in temperature of the brake either to cause outward movement of the shoes in order to compensate, at least in part, for drum expansion, or to disable the said device during such time as the brake is subject to said increase in temperature

Compl. specn. 17 pages,

Drg. 3 sheets.

CLASS: 79.

155605,

Int Cl.: B 42 f 11/00.

AN IMPROVED FILE.

Applicant & Inventor : SEEMALLAIA PARAMASIVAM, 15, PUDUPET GARDEN STREET, ROYAPETTAH, MADRAS-600 014, TAMIL NADU, (NATIVE ADDRESS 4/1. VELAMPUR CHETTIAR STREET, ALAMPATTI. VIRUDHUNAGAR, RAMNAD DIST, TAMIL NADU,

Application No. 160/Mas/82 filed August 18, 1982

Appropriate office for opposition proceedings (Rule 4. Patents Rules, 1972) Patent Office, Madras Branch.

# 14 Claims

A, file formed from two separate sheets folded and adhered together to define a top that and a bottom flaw each of which separated from the other by an elongated unlight odge formed along one side of the file, wherein the top flap forming sheet extends bryond said upright edge and over-laps with the bottom flap, the clamping means being provid-ed with the extension.

Compl. specn. 10 pages.

Drg. 2 sheets.

Ind. Class: 32 F2b, 55 E6.

155606.

Int. Class: A 61 K 21/00, 607 d-51/36, 51|42.

Title: A NOVEL PROCESS FOR THE PREPARATION OF 5-ARALKYI-2, 4-DIAMINOPYRIMIDINES.

Applicant HINDUSTAN CIBA-GEIGY LIMITED OF 24, J. TATA ROAD, BOMBAY-400 020, MAHARASHTRA, AN INDIAN SUBSIDIARY OF THE SWISS COMPANY CIBA-GEIGY LIMITED BASLE, SWITZERLAND.

Inventor: KRISHNA GOVINDRAM DTVF.

Application No. 21, Bom/82 filed on 29th January 1982.

Complete after provisional left on 22 January, 1983.

Appropriate office for opposition proceedings (Rule 4, Patents Rules 1972) Patent Office Branch, Bombay.

### 2 claime

A novel process for the preparation of 5-aralkyl-2, 4-diamino pyrimidines of the general formula I

$$R_1$$
 $R_2$ 
 $R_3$ 
 $R_3$ 
 $R_4$ 
 $R_4$ 
 $R_4$ 
 $R_4$ 
 $R_4$ 

the provisional specification, wherein R1, R<sub>2</sub> and R<sub>3</sub> each represents a hydrogen atom or a lower alkyl, aryllower alko-xv, lower alkoxy or loweralkylthio group or any two of R<sub>1</sub>, Re and Re together represent an alkylenedioxy group as herein described and the remaining of R1, R2 and R3 represents a hydrogen atoms or a lower alkyl, lower alkoxy, aryllower alkoxy or lower alkylthio group, said process comprising hydrogentating a compound of the formula II

the provisional specification, wherein R<sub>1</sub>, R<sub>2</sub> and R<sup>3</sup> have the above defined meanings, with hydrogen as herein described and if desire, converting the resulting product of said formula I into its pharmaceutically accepable acid addition salt in a known manner.

Compl. specn. 11 pages. Drawings nil.

Provisional specification 11 pages Drawings 2 sheets.

CLASS: 162,

155607.

Int. Cl. D 07 b 1/00.

IMPROVEMENTS IN AND RELATING TO STRINGS. Applicant : JACOTRA AG, CASE POSTATE 707, RUE DU BASSIN 14, CH 200! NEUCHATEL, SWITZERLAND.

Inventor: 1 JACOB VAN RIJSWIJK.

Application No. 438/Cal/81 filed April 24, 1981.

Convention dated 28th April, 1980 (8013945) U.K.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 35 claims

A string for sports rackets which comprises a core, the core being constituted by one or more synthetic polymeric mono-filaments, the, or at least one of the monofilaments having a longitudinal bore, and, along the length of the bore one or more openings for the passage of fluid from the bore, the core being covered by a wrapping of synthetic polymeric material.

Compl. specn. 20 pages. Drgs. 3 sheets.

CLASS: 6-B2.

155608.

Int. CT. B 01 d 47/06.

A METHOD AND APPARATUS FOR TREATING A POLLUTED GAS WITH A LIQUID.

Applicant: LODGE-COTTRELL LIMITED, OF GEORGE STREET PARADE, BIRMINGHAM. B3 1QQ, ENGLAND.

Inventor<sub>8</sub>: 1. MICHAEL JOHN ASHLEY, 2. ROY, ANTHONY GREAVES, 3. JOHN GORDON WYATT.

Application No. 1105/Cal/81 filed October 1, 1981. Convention dated 3rd October, 1980 (8031942) U.K.

Appropriate office io, opposition proceedings (Rule 4. Patents Rules, 1972) Latent Office, Calcutta.

### 26 claims

A method of converting a polluted gas such as, far exumple, of the type described into cool and clean gas by treating said polluted gas with a liquid, wherein the liquid is directed from an extended surface (known in the art) of a spray device into the polluted gas; characterized in that the method comprises the steps of (a) continuously providing a film of said on said surface; (b) impacting the liquid immediately beyond the said surface with a gaseous stream such as an air stream at high velocity thereby to produce spray of liquid droplets, and (c) contacting the spray of liquid droplets so produced with said polluted gas; the interaction of said spray of liquid droplets on said polluted gas causing conversion of the latter into clean and cool gas.

Compl. specn. 29 pages. Drgs. 6 sheets.

CLASS: 80-K; 167-C.

155609

Int. Cl. B03c 3/66. 3/68.

APPARATUS FOR CONTROLLING THE OPERATING PARAMETERS OF AN ELECTROSTATIC PRECIPITATOR

Applicant: F. L. SMIDTH & CO. A/S., OF 77, VIGER-SLEV ALLE, DK-2500 VALBY, COPENHAGEN, DENMARK.

Inventor: 1. LFIF LIND.

Application No. 1428/Cal/81 filed December 17, 1981.

Convention dated 17th December, 1980 (8040463) U.K.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 8 Claims

An apparatus for controlling the operating parameters of an electrostatic precipitator energized by pulses superimposed on a DC-voltage, characterized in that it comprises means for continuously increasing the pulse height linearly with time a spark-over detector detecting spark-overs as reductions in the precipitator-voltage below a selectable set value; means sorting the spark-overs into different types according to the time of their occurrence and their duration; and means modifying the operating parameters of the filter in dependance on the type of spark-over detected.

Compl. specia. 15 pages.

Drgs. 1 sheet.

CLASS: 32-E & 40-A.

155610

Int. Cl. C08f 1/00, 3/00, 15/00.

A PROCESS FOR ELIMINATING THE BUILDUP OF POLYMERS ON THE INTERNAL SURFACES OF A POLYMERIZATION REACTION VESSEL.

Applicant: THE B.F. GOODRICH COMPANY, 277 PARK AVENUE, NEW YORK, NEW YORK 10017, UNIT-ED STATES OF AMERICA.

Inventors: 1. JOHN LARRENCE DORSCH, 2. DAVID JOHN SMITH.

Application No. 135/Cal/82 filed February 4, 1982.

Appropriáte office for exposition proceedings (Rule 4. Patents Rules, 1972) Patent Office, Calcutta.

having the general structure shown in formula I of the accompanying drawing

Formula 13

where R is H or an alkyl group, straight chained or branched, containing from 1 to 10 carbon atoms and X is an integer from 1 to 10.

Compl. specn. 17 pages.

Drgs. 1 sheet.

CLASS: 40-F.

155611

Int. Cl.: B01d 15/04.

IMPROVED PROCESS FOR THE REMOVAL OF MERCURY FROM MERCURY-CONTAINING WASTE WATER.

Applicant: LONZA LTD., OF GAMPEL/VALAIS, SWITZERLAND.

Inventors: 1. HEINZ HANNI, 2. BRUNO RICHETTI.
3. GUIDO WICKI. 4. EMILIO SALAMI.

Application No. 245/Cal/82 filed March 3, 1982.

Ap ropriate office for opposition proceedings (Rule 4, Patents Rules, 1972). Patent Office, Calcutta.

# 4 Claims

An improved process for the removal of mercury from mercury containing waste water (such as is obtained, for example, in the production of acetaldehyde) by treating the waste water with inon powder thereby reducing the ionic mercury present in the waste water into metallic mercury which is separated off in a known separating device; the improvement comprising treating in a known manner the waste water leaving said separating device and still containing ionic mercury with a known ion exchanger for substantially complete removal of mercury from the waste water.

Compl. specn. 5 pages.

Drgs. Nil.

CLASS: 32-F2 (b) & 55-E4.

155612

Int. Cl. C07 d 31/00, 31/20.

PROCESS FOR THE PREPARATION OF 3-PICOLINE.

Applicant : LONZA LTD., OF GAMPEL/VALAIS, SWITZERLAND.

Inventor: 1. ROLF DINKEL.

Application No. 247/Cal/82 filed March 3, 1982.

Appropriate office for opposition proceedings (Rule 4. Patents Rules, 1972) Patent Office, Calcutta.

# 14 Claims

A process for the preparation of 3-picoline, wherein a first reactant selected from acetaldehyde, its polymers acetaldehyde acetal and crotonaldehyde or two or more thereof is reacted in a known manner with a second reactant selected from formaldehyde, its polymers, formaldehyde acetal and hexamethylenetetramine or two or more thereof in liquid aqueous phase and in a mole ratio such as hereinbefore described, at a temperature of 180 to 280°C, in a closed vessel under pressure in the presence of an amide of an aliphatic, aromatic or heterocyclic mono- or poly-carboxylic acid, whereafter the 3-picoline thereby formed is recovered in a known manner.

Compl. specn. 12 pages.

Drgs. 1 sheet.

 $32-F_2$  (b) CLASS

155613

32 F<sub>1</sub>, 55 E<sub>8</sub> 4, 60-X d CLASS

155615

C07d 41/06 Int Cl

PROCESS FOR THE PURIFICATION OF E-CAPROL **ACTAM** 

STAMICARBON BV OF PO BOX 10, Applicant GELEEN, THE NETHERLANDS

Inventors ! PETER FRANCISCUS MARIA RUL-KENS, 2 NICOLAAS I R\NCISCUS HAASEN 3 OTTO GERRIT PLANTEMA

Application No 5(6/Cal/82 alled May 5 1982

Appropriate office to opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta

# 7 Cla ms

Process for the purification of E caprolactam, obtained through rearrang ment of cyclohexanone oxime by means of through rearrangement of evelohexanone oxime by means of sulphuric acid or oleum by subjecting the caprolactam to be putified to distillation under reduced pressure with se paration of low boiling and high boiling fixpurities characterized in that the distillation is carried out in two steps with at least in the 1st ste an evaporator with a rectification column containing packing material with a pressure drop of less than 2.5 mbar per theoretical tray the capiolactam to be putif the column of the 1st step the column product remaining in the 1st step is supplied to the bottom product remaining in the 1st step is supplied to the 2nd st p and in this step the high-boiling impurities are carried off as bottom product and the purified caprolactam is received as too product. is recovered as top product

Compl speen 8 pages

Drgs Nil

**CLASS** 129 G 155614

Irt CI B23p 3,26

DEVICE FOR COOLING HE HIS OF A CUITING MACHINI

Applicant VOLST ALPINE AKTIFNGFSELLSCHAFT, OF A 1011 VIENNA FRIEDRICHSTRASSE 4, AUSTRIA

1 ALFRED ZITZ, 28 OTTO SCHETINA, 3 HERWIG WRULICH

Application No 561/Cal/82 filed May 20, 1982

Appropriate office tor opposition proceedings (Rule 4, Patents R les 19/2) Fatent Office, Calcutta

# 2 Claims

Device for cooling the bit, of a cutting machine comprising a nozzie (22) airanged within the area of the bit (1) for the cooling wate. (1) by ejected under pressure and the water supply to said nozzle (22) can be closed by a valve cone (6), the pit (1) bying supported on the bit holder (2) for limited axial shifting movement under the action of the cutting pressure and against the restoring foce provided by a spring (5) and by the water pressure acting on the valve cone (6) and the valve cone (6) being coupled with the bit (1) by a coupling member (9) such that the valve cone (6) opens on occasion of a shifting movement of the bit (1) in the direction (4) of the cuting pressure, characterized in that with an arrangement in which the valve cone (6) is opening only at a predetermined load of the bit (1), the water pressure unstream of the valve cone (6) multiplied by that active surface (b c) of the valve cone (6) being subjected by the water pressure in the scars of closing the valve essentially corresponds to the restoring force and in that the spring (5) is given only such a strength that the spring moves the valve cone (6), with the witer supply shut off against the weight of the valve cone (6) and of the bit (1) and against the internal 1 strong against the internal 2 strong against the internal 2 strong against the internal 3 strong against the 3

Compl speen 10 pages

Drgs 1 sheet

C07c 51/52 129/16 Int Cl

PROCESS FOR THE PREPARATION OF CHLORHEXIDINE DINAPROVENATE

Applicant AUSONIA FARMACEUTICI 511, OF VIA LAURENTINA KM 24730, 00040 POMEZIA (ROMA), **ITALY** 

Inventor 1 LEONARDO DE VINCENTIIS

Application N 1125/Cal/82 filed September 28, 1982

Appropriate office for opposition proceedings (Rule 4, Patents Rules 1972) Patent Office Calcutta

# 5 Claims

A process for the preparation of the compound of formula shown in the accompanying drawing

wherein N, N" bis (4 chlorophenyl)-3 12-ciimino-2, 4, 11, 13-tetraaza-tetradecan-dimidoamide and (+)-6-methoxy-2 -methyl-2-naphthalene acetic acid, in a molar ratio substantially equal to 1 2, are reacted in suspension in solvents, at temperature between 10 and 100 C, and wherein the compound is isolated from the solution so obtained by cooling it

Compl speen 9 pages

Drgs 1 sheet

155616

CLASS 132D

Int Class B01f 9/10, 3/06

DEVICE FOR MIXING BY TURBULENCE GASTOUS FLUIDS AND SOLID PARTICLES IN SUSPENSION'

Applicant LAFARGE COPPEE, OF 28 RUE EMILE MENIER 75782 PARIS CEDEX 16, FRANCE, A FRENCH COMPANY

ALAIN DUPLOUY AND BERNARD LE Inventors BRAS

Application for Patent No 53/Del/81 filed on 28th January, 1981

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office Branch, New Delhi-110 005.

# 7 Claims

A device for mixing by turbulence gaseous fluids and solid particles in suspension comprising

- (a) a mixing chamber bounded laterally by a circular wall about a vertical axis and into which emerge two flows of gaseous fluids at least one of which contains said particles in suspension,
- (b) a first inlet located at the upper end of said chamber for introducing a first flow (A) forming a vortex in said chamber,
- (c) an outlet volute through which said 15t flow is discharged,
- (d) a second inlet located at the lower end and on the axis of said chamber for introducing a second axial flow (B) containing solid suspended particles, said axial flow (B) forming a jet which is sucked inside said vortex in order to mix therewith said first flow, the whole being exhiusted through said outlet
- (e) said outlet volute being located in the central portion of said chamber;

155619

(f) said chamber comprising an upper portion for the formation of said vortex and said outlet volute, and a lower portion which widens upwards between said second inlet and said outlet volute for the recovery and recycling into said axial flow (B) of said solid particles which escape from said vortex.

Compl. specn. 26 pages.

Drgs. 4 sheets.

CLASS: 71G, 131B2.

155617

Int. Cl.: E21c 47/00, 31/00.

"MULTI-PURPOSE MINING MACHINE".

Applicant: PLACER EXPLORATION LIMITED, A COMPANY INCORPORATED UNDER THE LAWS OF THE STATE OF NEW SOUTH WALES, AUSTRALIA, OF 106-128 WOODPARK ROAD, SMITHFIELD, NEW SOUTH WALES, AUSTRALIA

Inventor: BARRY SELLER.

Application for patent No. 63/Del/81 filed on 3rd February, 1981.

Convention date 11th February, 1980/PE 2317 (Australia).

Appropriate office for opposition proceedings (Rule 4. Patents Rules, 1972) Patent Office Branch, New Delhi-110 005.

# 8 Claims

A mining machine comprising a self-propelling power unit, a boom comprising a first part and a second part which lies at a depressed obtuse angle relative to the first part, a first pivotal connection between the power unit and the boom first part with an axis of pivot generally horizontal, a second pivotal connection connecting the boom first and second parts with an axis of pivot substantially at right angles to the axis of the first pivotal connection, extensible raising and lowering means connecting the power unit to the boom first part, extensible slowing means connecting the boom first and second parts, shaft driving means on the boom second part, a power shaft rotatably housed in the boom second part and coupled to the shaft driving means and coupling means at the output end of the boom second part to allow driving connection to a cutting tool.

Compl. specn. 9 pages.

Drgs. 3 sheets.

CLASS: 10D, 169A.

155618

Int. Cl.: F42b 39/04, F41f 9/00.

"AN AMMUNITION LOADING TABLE".

Applicant: AKTIEBOLAGET BOFORS, A JOINT-STOCK COMPANY ORGANISED UNDER THE LAWS OF SWEDEN, OF \$-691 80 BOFORS, SWEDEN.

ventors: OLLE GUSTAVSSON, GORAN SUNDMAR. Application for patent No. 92/DEL/1981 filed on 19th February, 1981.

Appropriate office for opposition proceedings (Rule 4 Patents Rules, 1972) Patent Office Branch, New Delhi-110 005.

# 11 'Claims

An ammunition loading table for receiving rounds of ammunition and feeding them to a loading tray, the table comprising at least one endless chain, a plurality of ammunition receiving elongate open troughs, each of said troughs being receiving elongate open troughs, each of said froughs being divided along its elongate axis so that each of said troughs is formed by a pair of separable segments with each segment pivotally coupled to said chain, said endless chain provided with a first and a second sprockets forming upper and lower horizontal chain segment runs the upper chain segment runs defining an ammunition loading plane to accommodate a predetermined number of troughs side-by-side thereby enabling one or more rounds of ammunition, up to said predetermined number, to be loaded from above into said trough segments, and a stepped drive mechanism coupled to at least one of said sprockets to move one trough at a time from one of said chain segment runs to the other to feed one round at a time from said trough to the loading tray.

Compl. specn. 17 pages.

Drgs, 5 sheets.

CLASS: 10C.

Int. Cl.: F42b 39/06.

"AMMUNITION LOADING TRAY".

Applicant: AKTIEBOLAGET BOFORS, A JOINT-STOCK COMPANY ORGANISED UNDER THE LAWS OF SWE-DEN, OF S-691 80 BOFORS, SWEDEN.

Inventors: OLLE GUSTAVSSON, GORAN SUNDMAR.

Application for patent No. 93/DEL/1981 filed on 19th February, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office Branch, New Delhi-110 005.

# 11 Claims

An ammunition loading tray for an ammunition handling system which enables a round of ammunition to be transported by the tray from a loading position at the side of a gun to a ramming position behind the barrel of the gun, the tray comprising an elongate base to receive said round of ammunition, an elongate retention member to retain said round of ammunition in said loading tray, means mounting said retention member above said base, and resilient means urging said retention member to an initial position so that as said round of ammunition is fed to said loading tray it forces the retention member out of its initial position above said base to enable the round of ammunition to drop into said base, the retention member then returning under the force exterted by said resilient means to its initial position at which it retains said round of ammunition in said base and provides a sliding engagement with at least a portion of said round of ammunition to prevent the round of ammunition from riding up out of the base as the round of ammunition is rammed from the tray into the gun barrel.

Compl. specn. 17 pages.

Drgs. 2 sheets.

CLASS: 68D, 126A.

155620

Int. Cl.: H01b 7/32, G01r 31/08.

"IMPROVEMENTS IN OR RELATING TO APPARATUS FOR FAULT DETECTION".

THE GENERAL ELECTRIC COMPANY, P.L.C. OF 1 STANHOPE GATE, LONDON WIA1EH, ENGLAND, A COMPANY INCORPORATED UNDER THE LAWS OF ENGLAND.

Inventor: ALLAN THOMAS JOHNS.

Application for patent No. 101/Del/81 filed on 23rd February, 1981.

Convention date 1st March, 1980/8007051 (G.B.).

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office Branch, New Delhi-110 005.

# 9 Claims

Apparatus for determining the direction of a fault on an conductor from a menitoring resistion along the length of the conductor companies are many connected with said conductor for forming signals visit are increase of electrical variables at the monitoring position, and means connected with said means for forming said signals for monitoring said signals to obtain an indication of the fault direction wherein said signal forming means comprises means for forming first and second signals  $S_1$  and  $S_2$  of the form:

is the difference between the steady-state where vFr' voltage and the instantaneous voltage on conductor, at the monitoring position;

> (t) is the product of the difference between the Rifr steady-state current and the instantaneous current on the conductor, at the monitoring position and a constant (R) which is related to the surge impedance of the conductor; and

 $K_1,\ K_2,\ K_3$  and  $K_4$  are called positive of neutral constant, and said monitoring means comprises sequence detector means for determining the sequence in which the signals  $S_1$  and  $S_2R$  vary from selected values

Compl specn 27 pages

Drgs 6 sheets

CLASS 50B

155621

Int CI F24f -- 3/00

"MINIMUM AIR FLOW CONTROL DEVICE FOR AN AIR DISTRIBUTION UNIT

Applicant CARRIER CORPORATION A CORPORATION ORGANIZED UNDER THE LAWS OF THE STATE OF DELAWARE, UNITED STATES OF AMERICA, HAVING ITS PRINCIPAL PLACE OF BUSINESS AT SYRACUSE, NEW YORK, UNITED STATES OF AMERICA

Inventors DAVE ) ALEXANDER TULOWIECKI AND RICHARD ROLAND LAVASSAUR

Application for patent to  $348\,/\mathrm{DH\,I}/1981$  filed on 2nd June, 1981

Appropriate office for apposition proceedings (Rule 4, Patents Rules, 1972) Patent Office Branch New Deihi-110 005

# 3 (laims

A minimum airflow control device for an in distribution unit comprising bellows controlled dampe meins for controlling the flow of conditioned air into an area first regulator means for supplying control air to said bellows to citize so dellows to inflate in accordance with the pressure of said control air a the modat for controlling the pressure of aid control air over a first pressure range in response to the setting of said thermostat to thereby control the inflation of said bellows a ord regulato means for control ing the pressure of said control air over a second pressure range whereby said bellows are inflated so as to ployed a minimum flow of conditioned air independent of said thermostat

Compl specn 8 pages

Drgs 2 sheets

CLASS 65 B A

155621

Int Cl H0 1 f - 19/00 15,00

"AN IMPROVED ON LOAD FOR SELECTOR"

Applicant ASSOCIATED TAPCE ANGERS LIMITED A BRITISH COMPANY OF FUI BOURNE ROAD, LONDON E17 4EQ UNITED KINGDOM

Inventor ALBERT EDWARD NEWMAN

Application for Patent No 383/DLL/1981 filed on 15th June, 1981

Convention date 17th June 1980/8019736/(UK)

Appropriate office to opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office Branch, New Delhi-110 005

# 16 Claims

An on-load top selector for a tran former, the tap selector comprising a plurality of first contacts mounted at fixed locations on a fixed support so as to be electrically insulated and uniformly spaced apart, from each other, and movable carrier means currying main contact means and a pair of bridging contacts electrically connected by in impedance, the bridging contacts being arranged so that when the main contact means is in a stationally operative sition in electrical contact with any one of said first confact, they are positioned on opposite sides of the chosen first contact, and when the movable carrier means is moved in fairly to the fixed support to effect movement of the initial contact means out of electrical contact with an adjacent see earlifiest contact, they bridge between the chosen and selected first contact, the bridge between the chosen and selected first contacts, the bridging contacts are mounted on which age carried by the said carrier means the said linkage being sperable to vary the separation between the bideing contacts in the direction of movement of the movable currier means relative to the fixed support

Compl speen 17 pages

D gs 3 sheets

CLASS 47 C

155623

Int Ci C10b 39/00

APPARAILS FOR DRY COOLING OF HOT RAW COKF

Applicant DR ( OTIO & COMP GmbH., OF CHRIST-STRASSE 9 4630 BOCHUM WEST GERMANY

Inventor 1 DR CARL HENIX STRUCK, 2 RALF SCHUMACHER

Application No 161/Cal/81 filed February 12, 1981

Appropriate office for opposition proceedings (Rule 4, Latents Rules 1972) Patent Office, Calcutta

# 11 Claims

An adjustitus for preforming a process of dry cooling of hot law coke which is being pushed from the chambers of a coke over plant and cooled in a cooling chamber by direct and or indirect contact with a coolant which comprises two or more vertical coolers which are disposed adjacent one arother and have a common hot look and discharge locks, the coolers being preceded by a common feed chamber or prechamber in which an inclined grating cooled by a coolant is disposed above one by more coolers, coke of a predetermined grain size being able to pass through the grating into the cooler below whereas the coarser fraction goes over the grating into a different cooler

Compl specn 12 pages

Drgs 3 sheets

CI ASS 32 F<sub>2</sub> b & 60-X<sub>1</sub>

155624

Int Ct C07d 5/34

A PROCESS FOR PRI PARING A CARBAMATE DERIVATIVE

Applicant OTSUKA CHEMICAI CO LID OF NO 10 BUNGO MACHI HIGASHI KU, OSAKA-SHI, OSAKA JAPAN

Inventois 1 TAKESHI GOTO 2 AKIRA TANAKA, 3 NOBUYOSHI ARAI 4 HISASHI FAKAO, 5 TAKASHI SOEDA, 6 HIROYUKI YATAKE, 7 SADAHIKO IIDA, 8 NORIO YASUDOMI 9 NORIO OSAKI, 10 TADATERU MURATA 11 MITSUYASU KAWADA

Application No 940/Cal/81 filed August 24, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules 1972) Patent Office Calcutta

# 11 Claims

A process for preparing a carbamate terivative represented by the formula (1) shown in the accompanying drawings,

wherein R<sup>1</sup> and R<sup>2</sup> which my be the same or different, each represents (1) X-COOR<sup>3</sup>, in which X represents an alkylene group having 1 to 6 carbon atoms, and R<sup>3</sup> represents an alkyl group having 1 to 6 carbon atoms or a cycloalkyl group having 2 to 6 carbon atoms or (2) Y CN, in which Y represents in alkylene group having 1 to 6 carbon atoms and R<sup>3</sup> turner represents an alkyl group having 1 to 8 carbon atoms at a choolkyl group having 1 to 8 carbon atoms at a choolkyl group having 1 to 8 carbon atoms a carbon alkyl group which may be substituted with a halogen atom, an alkyl group having 1 to 3 carbon atom a phenyl group which may be substituted with a halogen atom an alkyl group having 1 to 3 airbon atoms or an alkoxy group having 1 to 3 airbon atoms or Z R<sup>4</sup> in which Z i piesents a carbonyl group or a ultoryl group and R<sup>4</sup> represents an alkyl group having 1 to (a bon atoms a phenyl group, a benzyl group, an ilkoxy group ha ing 1 to 6 carbon atoms or a phenoxy

group, which comprises reacting a compound represented by the formula (II) shown in the drawings

with sulfur dichloride to form 2, 3-d'hydro-2, 2-dimethylbensofuran-7-yl N-(chlorosulfenyl)- N-methyl-carbamate represented by the formula (III) shown in the drawings,

which is then reacted with an amine compound represented by the formula (IV) shown in the Jrawings.

wherein R1 and R2 are as defined hereinbefore.

Compl. specnt 79 pages.

Drgs. 5 sheets.

CLASS: 99-E + 179-F.

155625.

Int. Cl. B 65 b 7/26; B 65 d 51/00; B 67 b 3/14.

SNAP HINGE OF PLASTIC MATERIAL.

Applicant & Inventor: WILHELM WIESINGER, OF KOCHLISTRASSE 2. CH-8004 ZURICH, SWITZERLAND.

Application No. 36/Cal/82 filed January, 7, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 18 claims

An integral snap hinge of plastic material, wherein two hinge members adapted to be folded about a main geometric axis are flexibly interconnected by at least one connecting element disposed between film hinges, and wherein at least one component of the snap hinge is resilient to perform the snap action, characterized by the following features:

- (a) The film hinges which adjoin a connecting element are straight or curved are diverging and are inclined with respect to the main geometric axis and
- (b) the hinge members are flexibly interconnected at least one additional place along the main geometric axis.

Compl. specn. 21 pages. Drgs. 4 sheets.

\*CLASS: 39 L & M.

155626.

Int. Cl. C 01 b 25/22, 25/26.

A METHOD FOR WET GRINDING PHOSPHATE ROCK WITH MINERAL ACID WATER.

Applicant: DAVY McKFE CORPORATION, OF P. O. DRAWER 5000, I AKELAND FLORIDA 33803, U.S.A.

Inventor: 1. WARREN HOGUF LANG.

Application No 1164/C1/81 filed October 21, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

### 5 claims

A method for wet grirding phosphate rock with a phosphate rock-compatible, mineral acid waste water from a phosphoric acid manfacturing plant in corrosion-susceptible milking medic to produce a processible phosphate rock slurry which is useful for the production of wet process phospheric acid comprising preliminarily at least partially neutralizing the mineral acid water ov contacting the mineral acid water with phosphate rock containing base-forming constituents sufficient to increase the pH of the acid water to 1.6 or higher and render it less corrosive on the milling media, and milling phosphate rock with the at least partially neutralized acid water in the milling media to increase the surface area of phosphate rock.

Compl. specn. 48 pages, Drgs 1 sheet.

CLASS: 32-F3 b.

155627.

Int. Cl. C 07 c 63/26.

PROCESS FOR PRODUCING TEREPHTHALIC ACID FROM DIMETHYLTEREPHTHALATE AS INTERMEDIATE PRODUCT.

Applicant ·· DYNAMIT NOBEL AKTIENGESELLS-CHAFT, OF POSTFACH 1209, 521 TROISDRORF, WEST GERMANY.

Inventors: 1. EUGEN HADAMOVSKY, 2. ANTON SCHOENGEN, 3. DR. HEINZ SCHROEDER.

Application No. 1331/Cal/81 filed November 26, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 10 claims

Method of producing terephthalic acid (TPS) from dimethylterephthalate (DMT) as intermediate product through the oxidation of n-xylene and/or p-toluic acid methylester (PTE) with oxygen-containing gases in the presence of heavy metal-containing oxidation catalysts at increased temperature and increased pressure, esterification of the oxidation mixture with methanol at increased temperature and increased pressure, separation by distillation of the crude ester into a PTE-rich fraction which is returned to oxidation, a residue fraction also a crude DMT, continuous hydrolysis of the crude DMT with water with a mass ratio of crude DMT to water between 3: 1 and 0.1: 1 and at temperatures between 350 and 180°C and the pressure required to maintain the liquid phase, crystillisation of the TPS at temperatures between 300 and 180°C, replacement of the mother liquor by desalted water, and extracting the TPS from the reaction mixture, characterised in that hot water vapour of 350 to 180°C is introduced at the base of a multi-stage invalolysis reactor and hot crude DMT of 350 to 140°C is introduced at the head of the reactor and with a conversion of 90% or more there is distilled at the base a reaction mixture as liquid phase, or as solid phases suspended in the liquid phase, and also at the head a methanol-water mixture at a temperature of 300 to 150°C, this mixture is condensed, a nortion of the condensate is released as reflux at the head of the process.

Compl. opecn. 15 pages. Drgs. 3 sheets.

CLASS: 198-B

155628.

Int. Cl. B03d 1/02.

A FROTH FLOTATION PROCESS FOR THE UP-GRADING OF COAL".

Applicant: THE DOW CHEMICAL COMPANY, OF 2030 DOW CENTER ABBOTT POAD VIDLAND MICHIGAN 48640, UNITED STATES OF AMERICA.

Inventors: ROBERT EUGENE HEFNER, JR.

Application No. 1439/Cal/81 filed December 18, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 8 claims

A froth flotation process for the upgrading of coal which comprises floating coal particles of flotation size in a frothing aqueous medium in the presence of a fuel oil collector and an effective amount of a frother characterized in that the fiother is a condensation product of a fatty acid or fatty acid easter and a compound represented by the formula I.

$$\begin{array}{c} R \\ N \end{array} + \left( \left( C +_2 \right)_{y} \stackrel{R}{N} - \right)_{x} \left( C +_2 \right)_{y} \stackrel{R}{N} \\ R \end{array}$$

wherein x is a whole number from 1 to 4; each y is 2 or 3; R is independently hydrogen or

# ТТ

with the proviso that at least one R is not hydrogen, and wherein each R is independently hydrogen, methyl or ethyl; said condensation product being prepared in a molar ratio of at least one mole of fatty acid or ester for each mole of the compound of formula 1 and said condensation product being employed in it sfree form or as an acid derivative with the proviso that a significant percenage of the compounds in the condensation product bear amide moieties.

Compl. specn. 17 pages. Drgs. nil.

CLASS: 127-I.

155629.

Int. Cl. F 16g 100.

APPARATUS FOR INTERMITTENTLY DRIVING END-LESS BELT IN AUTOMATIC SCREEN PRINTING MA-CHINE.

Applicant: TOSHIN KOGYO CO, LTD., OF 11-36, 9-CHOME, MINAMI-MUKONOSO, AMAGASAKI-SHI, HYGO-KEN, JAPAN.

Inventors: SHIRO ICHINOSE 2. SANETO MACHIDA, 3. SHOTOKU MURAKAMI, 4. TERUO FURUSAWA.

Application No. 98/Cal/82 filed January 25, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 2 claims

An apparates for intermittently driving endless belt by two electric motors in an automatic screen printing machine, which comprises a pair of rollers, an endless belt supported on the rollers, a direct current electric motor for intermittently driving said rollers and a control mechanism for setting a repeat length of the endless belt while converting it to a pulse number, detecting the actual feed length of the endless belt as a pulse number and subtracting the detected pulse number from the set pulse number to stop the endless belt at the repeat length corresponding to the set pulse number, wherein each of the pulling and feed out rollers supporting the endless belt is provided with a direct current electric motor capable of independently the roller, a pulse generator for detecting as a pulse number the actual feed length of the endless belt according to displacement of the roller and a digital servo mechanism for subtracting the detected pulse number from the set pulse number and reducing the speed of the direct current electric motor and stopping the same to stop the belt at the repeat length corresponding to the set pulse number, and a deviation comparing counter is arranged between the two pulse generators and at least one digital servo mechanism to compare the detected pulse number from the pulse generator on the feed ou rollers side and correct and control inputs to the electric motors according to the deviation, whereby any difference of the position is not produced between the two rollers and moment during any mode of starting, running and speed reduction and therefore, no tension for driving is imposed on the endless belt.

Compl. speen. 15 pages, Drgs. 3 sheets,

CLASS: 32F<sub>2b</sub> & 60X<sub>2</sub>d.

155630

Int. Cl ← 07d 99/14; J9/24

A NEW PROCESS FOR PRODUCING PENCILLIN AND CUPHALOSPORIN DERIVATIVES".

Applicant & Inventor: YOUNG SUL KIM, 302-62, EEC-HON-DONG, YONGSAN-KU, SEOUL, KOREA.

Application No. 502/Cal/82 filed May 5, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 2 claims

A process for the production of a pencillin derivative of the general formula 1.

m which R represents a hydrogen atom or a lower alkyl group containing 1 to 4 carbon atoms,  $R_1$  represents a hydrogen atom, or a hydroxyl group. M represents a hydrogen atom, an alkali metal atom such as sodium or potassium, or a trialkyl ammonium adical of a lower alkyl amine containing 1 to 4 carbon atoms, comprising reacting a compound of general formula  $V_{\rm s}$ .

in which  $\mathcal{R}$  and  $\mathcal{M}$  have the same meanings as above, with phosgene of trachloromethyl chlorocarbonate to produce mixture of the new reaction intermediates of general formal lae X, XI, and XII

and reacting further any one or more of the said intermediates with a compound of general formula XIII.

in which R has the same meaning as before.

Compl. specn. 9 pages. Drgs. 2 sheet.

**CLASS**: 88-F.

155631.

Int. Cl. B 01 d 53/02.

PROCESS FOR THE REMOVAL OF H<sub>2</sub>S FROM A SOUR GASEOUS STREAM.

Applicant: SHELL INTERNATIONALE RESEARCH MAATSCHAPPIJ B. V., OF CAREL VAN BYLANDT-LAAN 30, THE HAGUE, THE NETHERLANDS.

Inventors: 1. GEORGE CONSTANTIN BLYTAS, 2. ZAIDA DIAZ.

Application No. 596/Cal/82 filed May 24, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

### 16 claims

A process for the removal of  $H_2S$  from a sour gaseous stream, which process comprises the following steps:

- (a) contacting the sour gaseous stream in a contacting zone at a temperature below the melting point of sulphur with a reactment solution containing at least one reactant selected from a group of reactions which group consists of polyvalent metal ions and polyvalent metal chelate compounds in an amount from 1 to 15 moles per mol H<sub>2</sub>S, and also a reaction rate modifier comprising one or more alkanediols having in the range of from 4 to 12 carbon atoms per molecule in an amount from 0.1 to 10% by weight, calculated on the reactant solution, and
- (b) separating a purified gaseous stream from an admixture containing crystalline sulphur, a reduced reactant and the reaction rate modifier.

Compl. specn. 17 pages. Drgs. 1 sheet.

CLASS: 27-C & I

155632.

Int. Cl. ZB 28 b 7/32, 21/20, 21/86.

RIGID CORE FORMER DEVICE FOR USE IN THE CONSTRUCTION OF CONCRETE OR OTHER STRUCTURES.

Applicant & Inventor: KANDIAH THARMA NAYAGAM, OF 6B, 2ND FLOOR, LORONG MEDAN TUANKU SATU, KULALUMPUR, MALAYSIA.

Application No. 1120/Cal/76 filed June 23, 1976.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 10 claims

A rigid core former device for use in the construction of concrete or other structures, comprising a pair of inter-engaging former elements each element having at least one shaping surface, a resilient open-ended sleeve surrounding the former elements and serving normally to bias the elements into a first position, and means for moving the former elements relative to one another, against the action of the resilient eleve, into a second position.

Compl. specn. 8 pages. Drgs. 3 sheets.

5-457 GI /84

CLASS: 154C, D, G.

155633.

Int. Class: B41m 1/28, B23p 1/04.

"SEMI-AUTOMATIC ELECTROCHEMICAL MARKING MACHINE FOR MARKING BRAND NAMES, MONOGRAM AND THE LIKE ON METALLIC PRODUCTS".

Applicant: COUNCIL OF SCIENTIFIC AND INDUSTRIAL RESEARCH, RAFI MARG, NEW DELHI-110001, INDIA AN INDIAN REGISTERED BODY INCORPORATED UNDER THE REGISTRATION OF SOCIETIES ACT (ACT XXI OF 1860).

Inventors: SUSHIL UMAR BASU, RAMESH CHANDRA BISHNU AND BIKAS RANJAN GUHA.

Application for Patent No. 105/Del/81 filed on 24th February, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office Branch, New Delhi-110005.

# 4 claims

A semi-automatic electrochemical marking machine for marking brand namts, monogram and like on metallic products comprising a perforated cathode plate fixed o an adjustable holder and a foot operated anode, a stencil paper with the desired print of the brand name or the like to be marked located on the said cathode plate, a lurality of sprayers fitted on the side of the cathode plate to hold the stencil in position and to spray the electrolyte thereon ,a foot lever mechanism to actuate the anode to contact the metallic product to be marked for a predetermined time period set in the timer and solencid unit to obtain the desired marking on passage of electric power from the roains supply unit by means of a conventional rectifier transformer unit terminals connected to said anode and cathode plates

Compl. specn. 9 pages. Digs. 2 sheets.

CLASS: 206C.

155635.47

Int. Class: H04b 7/20, H01q 13/00.

"AN AERIAL ASSEMBLY".

Applicant: THOMSON-BRANDT, OF 173 BL. HAUSS-MANN. 75008 PARIS, FRANCE, A FRENCH COMPANY.

Inventor: CLAUDE NARBONNE.

Application for Patent No. 121/Del. 81 filed on 4th March, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office Branch, New Delhi-110005.

# 12 claims

An aerial assembly comprising an antenna holder and an antenna mounted thereon for direct reception of elevision broadcasts transmitted by a geostationary satellite wherein said antenna holder comprises a pole located in a preselected position with respect to the earth; means for mounting said pole in said selected position, said means for mounting said pole adapted to permit rotary movement of said pole about the longitudinal axis of said pole with a view to adjusting the antenna in azimuth; rear portions of said antenna connected to said pole by means of a fixed arm and a movable arm; said fixed art being rigidly secured to said pole at one end of the fixed arm while the other end of said fixed arm is hingedly connected to the rear of said antenna; said movable arm being hingedly connected to said pole and to the rear of said antenna whereby the raising or lowering of said movable arm in relation to the pole enables the antenna to be adjusted in the vertical plane to select the site angle of the antenna.

Compl. specn. 10 pages. Dres. 3 sheets.

**CLASS**: 190C.

155635.

Int. Class: F03b 13/00.

Applicant: VOEST-ALPINE AKTIFNGESELLSCHAFT, OF WERKSGELANDE A-4010 LINZ, AUSTRIA, AN AUSTRIAN COMPANY.

Inventor: HERMAN ARNE LINDQUIST.

Application for Patent No. 155/Del/81 filed on 19th March, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office Branch. New Delhi-110005.

# 5 claims

A turbine resembly complaine, a flow passage, an inlet chamber and a rumble chamber provided at the ends of the flow passage, said rumble chamber provided at the ends of the flow passage, said rumble chamber being localed in relation to the flow discussion of the flow of the most of the chamber, said flow passage between the lateral of the rumble chamber being divided into two piperses, and the rumble being passage and an output mechanism extending through the space between the two piperses and operations discussed in the space between the two piperses and operated and protecting the turbine rumble root the generation discussed in the cach of said pipelines of the flow gassage and each pitel he having a cross section substantially same as that part of the cross-section of the inlet commber at its outlest which is dimensed on the same side of said center plane as the rid pipers, the turbine rumber being non-rootably commend to a table ne shart mounted in a coaxial carrying tube, said carryins tube extending through and sealed in both said profiles and rumber chamber to form a junction.

Compl. specn. 16 pages. Drgs. 4 sheets.

CLASS: 140B2 & 77B2.

155636.

Int. Class: A23d 5/00.

"PROCESS FOR OBTAINING CORN OIL FROM CORN GERMS".

Applicant: CPC INTERNATIONAL INC., A CORPORATION ORGANISED UNDER THE LAWS OF THE STATE OF DELAWARE U.S.A.. OF INTERNATIONAL PLAZA, ENGLEWOOD CLIFFS, NEW JERSEY 07632, UNITED STATES OF AMERICA.

Inventors : KLAUS DIETER STOLP & ROLF WILHELM STUTE.

Application for Patent No. 167/Del/81 filed on 24th March, 1981.

Convention date 18th April, 1980/8012909/(U.K.).

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office Branch, New Delhi-110005.

# 3 claims

- 1. Process for obtaining a high quality crude corn oil requiring only mild refining in order to produce a final edible corn oil, comprising the following steps:
  - (A) milling, at a temperative not above 50°C, wet corn germs obtained from the corn wet milling process and having a pH of between 3-4 until at least 80% of the the germs have been reduced to a particle size of less than 160 microns and wherein the cells of the germs are opened but the cell walls are otherwise substantially intact, at least the final stage of the milling operation being conducted in the presence of sufficient additional water to provide an aqueous slurry having 10% to 25% solids, by weight
  - (B) promtply subjecting the milling slurry, with added water if necessary to bring the solids content to not greater than about 17%, to leaching forces, whereby the slurry is separated into a solid phase and a liquid phase and whereby substantially all of the oil and a portion of the protein are leached from the germ dry substance into the liquid phase; and
  - (C) promptly senarating and recovering the oil from the liquid phase.

Compl. specn. 23 pages.

CLASS: 32 B.

Int. Class: C07c 1/00.

155637.

"PROCESS FOR PRODUCING AROMATIC HYDRO-CARBONS USABLE AS GASOLINE CONSTITUENTS AND/OR UNSATURATED HYDROCARBONS SELECTED FROM ETHYLENE, PROPENE AND BUTENES".

Applicant: IMPERIAL CHUMICAL INDUSTRIES PLC., FORMERLY KNOWN AS IMPERIAL CHEMICAL INDUSTRIES LIMITED, OF IMPERIAL CHEMICAL HOUSE, MILLBANK, LONDON, SWIP 31F, ENGLAND A BRITISH COMPANY.

Fiveness: (C.MT DAMET SHORET & MICHAEL STAINES SPENCER.

Application for Patent No. 168/Del/81 filed on 25th March, 1981.

Convention date 11th and 1080/8012103/(U.K.).

Appropriate office for opposition proceeding (Rule 4, Patents Rules, 1972) Peter Mile, Ermeh, May Debi 110005.

### 11 claims

A process for predicting leads and the hydrocorbons usable as recolling conditions, and the unsaturated hydrocarbons solected from othylene, mapune and butenes comprises the steps of

- (a) generating a synthesis gas by known method containing carbo monoxide and hydrogen by reacting a carbonaceous feedstock with oxygen and/or steam and, to the extent necessary, purifying the gas and subjecting it to the shift reaction and carbon dioxide removal;
- (b) synthesising a mixture of methanoi and aliphatic alcohols in the C<sub>2</sub> to C<sub>5</sub> range over a catalyst comprising the oxides of chromium, zine and at least one other metal having a divalent oxide difficulty reducible to the metal and more strongly basic than zine oxide:
- (c) subjecting at least one synthesis alcohol to an alcohol conversion catalyst whereby to produce the said aromatic and/or unsaturated hydrocarbons.

Compl. specn. 12 pages. Drg. 1 sheet.

CLASS: 50 F.

155638.

Int. Class: F25b 43/04.

"PURGE APPARATUS FOR REMOVING NON-CON-DENSIBLE VAPOUR FROM A REPRIGERATION SYS-TEM".

Applicant: CARRIER CORPORATION, A CORPORATION ORGANIZED UNDER THE LAWS OF THE STATE OF DELAWARE. UNITED STATES OF AMERICA, HAVING ITS PRINCIPAL PLACE OF BUSINESS AT SYRACUSE, NEW YORK, UNITED STATES OF AMERICA.

Inventor: KENNETH PETER, GRAY.

Application for Patent No. 170/Del/81 filed on 25th March, 1981.

Appropriate office for apposition proceedings (Rule 4, Parents Rules, 1972) Patent Office Branch, New Delhi-110005.

# 4 claims

A purge apparatus for removing non-condensible vapor from a refrigeration system comprising :

- a first purge chamber having a first condensing coil therein;
- a second purge chamber having second condensing coil therein:
- a conduit line having an orifice therein, connected between the refrigeration system and the first purge chamber to supply refrigerant vapour and non-condensible gases from the refrigeration system to the first purge chamber;
- a pump to pump refrigerant vapors and non-condensable gases from the first purge chamber into the second purge chamber at a higher pressure than the vapor in the first purge chamber:

a switch operable to activate the pump to pump refrigerant vapors and non-condensible gases to the second purge chamber in response to a rise in pressure in the first purge chamber:

a controlled outlet for exhausting non-condensible gases from the second purge chamber;

a controlled conduit for returning condensed refrigement from the second purge chamber to the first purge chamber; and

a controlled conduit for retunning condensed refrigerant from the first purge chamber to the refrigeration system.

Complispeen. 11 pages. Drawing 2 sheets.

CLASS: 32F1 - F3b 55D2

155639.

Int. Cl.: C07c - 63/10, c1n = -9/00.

Title: PROCESS FOR THE PREPARATION OF 4-CHILORO- (1-METHYLETHYL) BENZENEACETIC ACID FROM 1-(4-CHI OROPHENYL)-2-METHYL PRO-PAN-1 ONE.

Applicants: CAMPEGE & ARLIED PRODUCTS LTD., JEHANGIR BUILDING, 183, MAHATMA GANDHI ROAD, BOMBAY-400 023, MAHARASHTRA, INDIA.

Inventors: DR. PURSHOTAM BHAN, (2) DR. CHAN-'DRA SHEKHAR SHARMA, (3) DR. JANAKIRAM RAJA-RAM (4) HARMANDER PAL SINGH CHAWLA AND (5) DR. SUKHDEV,

Application No.: 300/BOM/1982 filed November 6, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Bombay Branch.

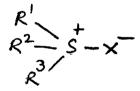
### 9 claims

A new process tor the preparation of 4-chloro- (1-methylethyl) benzeneacetic acid of structural formula I

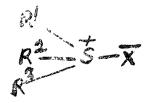
from the specification starting material 1-(4-chlorophenyl)-2-methylpropan-1-one of structural formula III

Comprising 23.

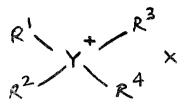
(i) treating 1-(4-chlorophenyl)-2-methylpropan-1-one of the structural formula III



with a trialkyl or arylalkylsulphonium salt such as herein described of general formula VI



using a phase transfer catalyst such as herein described of general formula VII



in presence of a base such as herein described with solvent such as herein described, to obtain 2-(4-chlorophenyl)-2-(1-mehylethyl) oxirane of structural formula JV

(ii) isomerizing the said 2-(4-chlorophenyl)-2-(1-methylethyl) oxirane by treatment with a Lewis acid or a Bronsted acid such as herein described to obtain 4-chloro-(1-methylethyl) benzeneacetaldehyde of structural formula V

(iii) oxidizing the said 4-chloro- (1-methylethyl) benzene-acetaldehyde using an oxidizing agent such as herein described with or without a phase transfer catalyst such as herein described of structural formula VII of the accompanying drawings and solvent such as dichloroethane, to obain 4-chloro- (1-methylethyl) benzene acetic acid of structural formula I of the accompanying drawings.

Comp' specn. 12 pages. Drg. 1 sheet.

CLASS:  $32-F_2$  (b);  $55-E_4$ ;  $60-X_2$  d.

155640

Int. Cl. : C 07 d 99/06.

PROCESS FOR THE PREPARATION OF 5, 6, 7, 7a-TETRAHYDRO-4H-THIENO (3, 2-C) PYRIDIN-2 ONE DERIVATIVES.

Applicant: SANOFI, OF 40, AVENUE GEORGE V, 75008 PARIS, FRANCE.

Inventors: 1. NORIO SUZUKI. 2. KYNICHI MATSU-BAYACHI. 3. SHINICHIRO ASHIDA, 4. IEAN-PIER-RE MAFFRAND, 5. ROBERT BOIGEGRAIN.

Application No. 1256/Cal/81 filed November 6, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta,

# 12 Claims

Process for the preparation of 5, 6, 7, 7a—tetrahydro-4H-thieno (3, 2-c) pyridin-2-one derivatives of the general formula I of the drawings,

in which R is a hydrogen atom or a phenyl radical optionally substituted by at least one halogenatom, lower alkyl radical, lower alkoxy radical, nitro group, carboxy group, alkoxycarbonyl radical or cyano group; R: is a hydrogen atom or a lower alkyl radical; and n is 0, 1, 2, 3 or 4; and of their acid addition salts with mineral and organic acids, wherein:

(a) a compound of the general formula II of the drawings,

in which R, R' and n have the same meanings as above, is treated with a solution of hydrogen peroxide in a mixture of acetic acid and hydrobromic acid to give a brommated derivative of the general formula III of the drawings.

in which R, R' and n have the same meanings as above;

(b) the brondinated derivative (III) is converted into an organo-magnesium compound in an inert anhydrous solvent, this organo-magnesium compound then being condensed with tert.—butyl perbenzoate to give a compound of the general formula IV of the drawings,

in which R, R and n have the same meanings as above; and

(c) the compound (IV) is heated to a temperature of from 80 to 180°C in the presence of a mineral or organic acid 10 give the desired derivative of general formula (1).

Compl. specn. 13 pages.

Drg. 1 sheet.

CLASS: 11-C Int. Cl.: A 23 k 1/16. 155641

A PROCESS FOR PREPARING IMPROVED ANIMAL FEED BY SUPPLEMENTING INDUSTRIALLY PRODUCED MIXED FFLD STOCK WITH METHIONINE.

Applicant: DEGUSSA AKTIENGESELLSCHAFT FOR-MERLY DEUTSCHI GOLD-UND SILBER SCHEDEAN-STALT VORMALS ROESSLER, OF 9 WEISSFRAUEN-STRASSE, FRANKFURT (MAIN) FEDERAL REPUBLIC OF GERMANY.

Inventors: 1. DR. HERBERT TANNER, 2. HFIDRUN-LEONORE BERTRAM. 3 REINHARD RICHTER, 4. DR. MANFRFD SPINDLER.

Application No. 1336/Cal/81 filed November 26, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 4 Claims

A process for preparing improved animal feed by supplementing industrially produced mixed feedstock as herein described with methionine characterized in that solution of sodium or potassium methionate is sprayed on said mixed feed and wherein in said solution the concentration of sodium methionate lies between 40 to 65% by wt. or the concentration of potassium methionate in said solution lies between 20 to 50% by wt. and wherein the amount of the said solution is between 0.01 to 5% by wt. of the finished inixed feed.

Compl. specn. 15 pages.

Drg. Nil.

CLASS: 32-E.

155642

Int. Cl.: C 08 f 1/00, 3/00, 15/00.

CONTINUOUS CATALYTIC PROCESS FOR PRODUCING ETHYLENE HOMOPOLYMERS AND COPOLYMER.

Applicant: UNION CARBIDE CORPORATION, AT 270 PARK AVENUE, NEW YORK, STATE OF NEW YORK-10017, UNITED STATES OF AMERICA.

Inventors . 1. BURKHARD ERIC WAGNER, 2 GEORGE LEONARD GOEKE, 3. FREDERICK JOHN KAROL, 4. KATHLEEN FRANCES GEORGE.

Application No. 1446/Cal/81 filed December 23, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

### 8 Claims

A continuous catalytic process for producing ethylene homopolymers or copolymers containing at least 97 mol percent of ethylene and no more than 3 mol percent of one or more alpha olefins containing from 3 to 8 carbon atoms said alpha olefins not containing any branching on any of their carbon atoms which is closer than the fourth carbon atom,

said polymers being produced in granular form and having a density of from 0.94 g/cm<sup>2</sup> to 0.97g/cm<sup>3</sup>, and a melt flow ratio of from 22 to 32.

which comprises contacting ethylene, or a mixture of ethylene and at least one alpha olefin containing from 3 to 8 carbon atoms, at a temperature of from 90°C to 115°C and a pressure no greater than 1000 psi, in a gas phase reaction zone, with particles of a catalyst system having beer produced from a precursor composition having the formula

# Mg<sub>in</sub>Ti(OR)<sub>n</sub>X<sub>p</sub> [ED]<sub>q</sub>

wherein R is an aliphatic or aromatic hydrocarbon radical containing from 1 to 14 carbon atoms, or COR' wherein R' is an aliphatic or aromatic hydrocarbon radical containing from 1 to 14 carbon atoms,

X is selected from the group consisting of Cl, Br, I, and mixtures thereof,

ED is an organic electron donor compound selected from the group consisting of alkyl esters of aliphatic and aromatic acids, aliphatic ethers, cyclic ethers and aliphatic ketones,

m is 0.5 to 56,

n is 0, 1 or 2

p is 2 to 116, and

q is 2 to 85,

and the said precursor composition having been diluted with an inert carrier material and having been completely activated with from 10 mels to 400 mols of an activator compound baving the formula

# $Al(R'')_dX_e''H_f$

wherein X" is Cl or OR"R' and R"! are the same of different and are saturated hydrocarbon radicals containing from 1 to 14 carbon atoms, e is 0 to 1.5, f is 1 or 0 and d+e+f=3

wherein the said precursor composition contains from 0.1 mol to 3 mols of boron holide compound per mol of electron donor in said precursor composition,

said boron halide compound having the formula

# $BR_{\mathfrak{c}}X'_{8^+\mathfrak{e}}$

wherein R is an aliphatic or aromatic hydrocarbon radical containing from 1 to 14 carbon atoms or OR', wherein R' is an aliphatic or aromatic hydrocarbon radical containing from 1 to 14 carbon atoms,

X' is selected from the group consisting of Cl, Br, and mixtures thereof, and

c is 0 or 1 when R is an alimbatic or aromatic hydrocarbon radical and 0, 1 or 2 under R is OR.

Compl. specn. 38 pages.

Drg. 1 sheet

CLASS 32-F2c,

155643

Int. Cl C 07 c 99/08

1 ROCESS FOR THE PREPARATION OF \*WATERY SOLUTIONS OF SODIUM METHIONATE

Applicant DEGUSSA AKTIENGESELLSCHAFT, WEISSFRAUENSTRASSF 9, 6000 FRANKFURT 1 WEST GIRMANY

Ji ento: 1 DR MANIRED SPINDLER, 2 DR HIRBERT TANNER 4 DR FRIEDHELM GEIGER, 4 DR FRIEDRICH BITTNER 5 DR JURGEN MARTENS.

Application No 96/Cal/82 filed January 22, 1982

Appropriate office for opposition proceedings (Rule 4 Patents Pules, 1972) Patent Office, Calcutta

# 3 Claims

Process for preparation of watery solutions of sodium methionate with a low content of sodium carbonate, suitable only for supplementing animal or poultry feed, from the crude hydrolysis mixtures formed during saponification of 5-(β methyl-mercapto-ethyl)-hydantoin with 11 to 6 equivalents of sodium hydroxide and/or sodium carbonate characterized thus, that the crude hydrolysis mixture is cooled to a temperature below 10°C, the sodium carbonate thus crystallized out is separated and the remaining solution of sodium methonate is concentrated to 40 to 65 per cent by weight

Compl specn 5 pages

Drg Nil

CLASS 4-A.

155644

Int C1 D65 = 53 (Of

Int Cl. B 65 g 53/00

LEVITATIONARIUM FOR AIR FLOTATION OF HUMAN BEINGS

Applicant AIRFLITE, INC AT 3043 JOE. W. BROWN DR, LAS VEGAS, NEVADA 80109, U.S.A

Invento: 1. JEAN ST-GERMAIN

Application No. 256/Cal/82 filed March 5, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent-Office, Calcutta.

# 17 Claims

A levitationarium for an flotation of human beings comprising a housing having an inner wall defining a levitation chamber, said levitation chamber defining a central vertical axis and, having an air inlet at the lower end thereof and an air outlet at the upper end thereof, shroud means upported in said housing proximate said lower end of said chamber and spaced from said inner wall, said shroud means having a central vertical axis ciaxial with said central vertical axis of said chamber, said shroud means having an air inlet at the lower end thereof and an air outlet at the upper end thereof communicating with said air inlet of said chamber, and blower means within said shroud means for propelling air upwardly through said shroud means and said chamber, the spacing of said shroud means from said inner wall defining an annular space through which an upward air suction flow is created by said blower means

Compl specn 12 pages

Drg 3 sheets

CLASS · 32-F<sub>3</sub> (d)

155645

Int. Cl. : C 07 d 5/06

PROCESS FOR THE PREPARATION OF TETRONIC ACID.

Applicant LONZA LID, OF GAMPEL/VALAIS, SWITZERLAND

Inventors 1 RAMUND MILLER 2 I FANDER TENUD

Application No 722/Cal/82 filed June 21, 1982

Appropriate office for opposition proceedings (Rule 4 Patents Rules, 1972) Patent Office Calcutta 6—457 GI/84

# 4 Claims

Process for the preparation of tetronic acid from a 4-halocetoacetic acid ester, wherein a 4-haloacetoacetic acid ester is reacted with an alkali metal salt of tert, butanol to give the corresponding 4-tert-butoxyacetoacetic acid ester which is then converted into tetronic acid by cyclising ether splitting such as herein described

Compl specn 7 pages

Drg Nil

CLASS 32-F2 c, 55 D2

155646

Int. Cl . C 07 c 101/00, A 01 n 9/00.

A PROCESS FOR THE PRODUCTION OF NOVEL PHOSPHONUM SALTS OF N-PHOSPHONOMETHYL-GLYCINE.

Applicant . STAUFFER CHEMICAL COMPANY OF WESTPORT, CONNECTICU 1 06881, UNITED STATES OF AMERICA

Inventors: 1 GEORGE BLACKMORE LARGE, 2 LAWRENCE LAMONT BUREN.

Application No 851/Cal/82 filed July 22, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 8 Claims

A process for the production of a compound having the formula shown in the accompanying drawing

$$R' - P + R^{2}$$

$$R^{3}$$

in which R<sup>1</sup>, R<sup>8</sup>, R<sup>9</sup> and R<sup>4</sup> are independently selected from the group consisting of C<sub>1</sub> - C<sub>10</sub> alkyl, benzyl, phenyl, substituted phenyl and substituted benzyl wherein said substituents are independently selected from halogen, lower alkoxy, and lower alkyl provided that at least one of R<sup>1</sup>, R<sup>2</sup>, R<sup>3</sup> or R<sup>1</sup> is benzxl substituted benzyl, or substituted phenyl which comprises reacting one equivalent of N-phosphonomethylglycine and one equivalent of an appropriate organic phosphonium halide in an equivalent amount in the presence of solvent, such as propylene oxide, in small portions over a period of time and stirring the reaction mixture and finally recovering the product in a conventional manner from the aqueous phase by removal of the water such as filtration followed by concentration of the resulting homogenous solution

Compl specn 28 pages

Drg. 1 sheet.

CI ASS 32-F<sub>1</sub>

155647

Int Cl C 07 c 143/78

A PROCESS FOR PREPARING TRIFLUOROMETH-ANE-SULFONANILIDES

Applicant SUMITOMO CHEMICAL COMPANY, I MITTED, OF NO 15, KI FAHAMA 5-CHOME, HIGASHI-KU, OSAKA-SHI, OSAKA-FU, JAPAN.

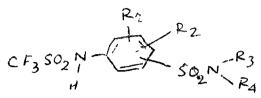
Inventors 1 HIROYUKI KONISHI, 2 SHUNICHI HASHIMOTO, 3 HIROMICHI OSHIO

Application No 940/Cal/82 filed August 10, 1982

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutts

# 4 Claums

A process for preparing trifluoromethanesulfonailides of the formula (I) of the accompanying drawings



wherein  $R_1$  and  $R_2$  are, same a different, each a hydrogenatom, a halogen atom of a  $C_1$ - $C_4$  alkyl group and  $R_3$  and  $R_4$  are, same of different, each a hydrogen atom, a  $C_1$ - $C_4$  alkyl group, a  $C_3$ - $C_6$  cycloalkyl group, a  $C_3$ - $C_4$  alkenyl group, a  $C_5$ - $C_6$  alkynyl group in  $C_1$ - $C_4$  alkoxy group a  $C_5$ - $C_7$  aralkyl group or a  $C_1$ - $C_4$  alkoxy ( $C_4$ - $C_4$ ) alkyl group or they may be combined together with the nitrogen atom to form a morpholino group, provided that  $R_5$  and  $R_4$  are not simultaneously hydrogen and also that

4-N, N-dimethylsulfamoyltrifluoromethanesulfonanilide;

4-(N. N-dimethyl ulfamoyl)-2-methyltrifluoromethanesultonanilide;

2-methyl-4-(n-methylsulfamoyl) trifluoromethanesulfonanilide;

3-(N. N-dimethylsulfa noyl) trifluoron ethanesulforamide; 3-(N-methylsulfamoyl) trifluoromethanesulfonanilide

5-(N, N-dimethylsulfamoyl)-2-methyltrifiuoromethanesulfonanilde are excluded, which comprises reacting a compound of the formula (II) of the drawings,

wherein R<sub>1</sub> and R<sub>2</sub> are c ch as defined above with chlorosul fonic acid in an inert solvent at a temperature of 0 to 100°C to give a compound of the formula (III) of the drawings,

wherein  $R_1$  and  $R_2$  are each as defined above, and reacting the latter with an amine of the formula (IV) of the drawings,

wherein  $R_s$  and  $R_4$  are each as defined above in an inert solvent at a temperature of from the freezing points of the solvent to the boiling point of the solvent to give the compound of fermula (I) of the drawings.

Compl specn. 28 pages

Drg. 9 sheets.

CLASS: 32-F<sub>1</sub>

155648

Int. Cl C 07 d 33/10.

A PROCESS FOR THE PREPARATION OF 7-CHLORO-4 OXO-1, 2, 3, 4-1FTRAHYDROQUENOLINE

Applicant RECKITT & COI MAN OF INDIA LIMIT-I D OF 41, CHOWRINGHEF ROAD CALCUTTA 700 071. STATE OF WEST BENGAL INDIA Inventois . 1 DR SURENDRA PRASAD BHATNAGAR, 2. DR AJAI PRAKASH, 3 DR. RAMANUJAM SRINI-VASA PRASAD, 4 DR. SATISH CHANDRA NIGAM.

Application No 1230/Cal/82 filed October 20, 1982

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta

# 12 Claims

Process of the preparation of 7 chloro-4 oxo-1, 2 3, 4-tetranydroquinoline which comprises

- (a) condensing m-chloroundine with a crylonitrile in presence of catalyst such as herein defined to obtain 3-(m-chloroundino) propionitrile which without isoliting is subjected to hydrolysis to obtain 1 (m chloroundino) propionic acid,
- (b) treating the obtained 3-(m-chloroanilmo) propionic acid of step (a) with p-toluene sulphony chloride in presence of a base as herein defined to obtain N-t syl-3(m-chloro-anilino) propionic acid;
- (c) preparing acid chloride of said 3-(m-chloroanitino) propionic acid by reacting the same with compounds of general formula R-Cl<sub>x</sub> wherein R is SO-or phosphorus and x is a number from 2 or 5,
- (d) subjecting the said acid chloride to the step of cyclisation and detosylation to obtain the desired 7-chloro-4-oxo-1, 2, 3, 4-tetrahydroquinoline.

Compl specn 14 pages

Drg. 1 sheet.

CLASS 22-1

155649

Int. Cl C 07 d 33/36

A TRCCESS FOR THE PREPARATION OF 4, 7-DICHTOROQUINOLINE

Applicant . RECKITT & COLMAN OF INDIA LIMIT-ED OF 41, CHOWRINGHEE ROAD, CALCUTTA-700 071, STATE OF WEST BENGAL, INDIA.

Inventors: 1. DR. SURENDRA PRASAD BHATNAGAR, 2. DR. BAJRANJ BALI SINGH, 3. DR. CHOLLAGHATTA GUNDU RAO. 4 DR. ARAKALI SREENIVASARAO RADHAKRISHNA.

Application No. 1231/Cal<sub>1</sub>82 filed October 20, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 5 Claims

A process for the preparation of 4, 7-dichloroquinoline which comprises reacting 7-chloro-4-hydroxyquinoline with thionyl chloride in presence of an N, N-dialkylamide, pouring the obtained reaction mixture in water and treating same with alkali to obtain 4, 7-dichloroquinoline.

Compl. specn. 5 pages.

Drg. 1 sheet.

CLSAS: 32-F<sub>1</sub>

155650

Int. Cl.: C 07 d 33/36.

A PROCESS FOR THE PREPARATION OF 4, 7-DICH-LOROQUINOLINE.

Applicant: RECKITT & COLMAN OF INDIA LIMITED OF 41, CHOWRINGHEE ROAD, CALCUTTA 700071, STATE OF WFST BENGAL, INDIA.

Inventors: 1. DR. SURENDRA PRASAD BHATNAGAR, 2 DR. BAJRANG BALI SINGH, 3. DR. CHOLLA-GHAT1A GUNDU RAO, 4. DR. ARAKALI SREENIVA-SARAO RADHAKRISHNA

Appplication No 1232/Cal/82 filed October 20, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 19/2) Patent Office, Calcutta.

# 5 Claims

V precess for the preparation of 4, 7-dichloroquinoline which comp uses reacting 7-chloro-4-hydroxyquinoline with chloro compounds of phosphorus pouring the obtained reaction mixture in water and reacting the same with alkali

characterized in that the said reaction is carried out in presence of an N, N-dialkylamide at a temperature of 15-35°C.

Compl. specn. 5 pages.

Drg. Nil.

CLASS: 32-F1

155651

Int. Cl.: C 07 d 33/36.

PROCESS FOR THE PREPARATION OF 4, 7-DICHLOROQUINOLINE.

Applicant: RECKITT & COLMAN OF INDIA LIMITED OF 41, CHOWRINGHEE ROAD, CALCUTTA 700071, STATE OF WEST BENGAL, INDIA.

Inventors: 1. DR. SURENDRA PRASAD BHATNAGAR, 2. DR. AJAI PRAKASH, 3. DR. RAMANUJAM SRINI-VASA PRASAD.

Application No. 1233/Cal/82 filed October 20, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

### 4 Claims

A process for the preparation of 4, 7-dichloroquinoline which comprises reacting 7-chloro-4-oxo-1, 2, 3, 4 tetra-hydroxyquinoline with phosphorus pentachloride in the presence of organic solvent such as herein described at a temperature of 80-140°C and preferably at a temperature of 80-140°C

Compl. specn, 7 pages.

Drg. 1 sheet

CLASS:  $32-F_1$ , 2 (b);  $55-E_4$ ;  $60-x_2d$ .

155652

Int. Cl.: C 07 d 49/36.

A NOVEL PROCESS FOR THE PREPARATION OF 2-METHYL-5-NITROIMIDAZOLE DERIVATIVES.

Applicant: RECKITT & COLMAN OF INDIA LIMITED OF 41, CHOWRINGHEE ROAD, CALCUTTA 700071, STATE OF WEST BENGAL, INDIA.

Inventors: 1. DR. SURENDRA PRASAD BHATNAGAR, 2. DR. BAJRANG BALI SINGH, 3. DR. SATISH CHANDRA NIGAM.

Application No. 1234/Cal/82 filed October 20, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 8 Claims

A process for the preparation of 2-methyl-5-nitroimidazole derivatives of general formula (I) of the accompanying drawings

wherein R is an alkyl group having 1 to 4 carbon atoms or aryl group, which aryl group may be substituted by groups such as nitro, methoxy, chloro which process comprises:

(i) reacting compound of formula II

wherein X is chloro or O-tosyl group with compounds of general formula RSNa wherein R is as defined above in presence of non aqueous solvent such as herein defined to obtain intermediate compound of general formula III

wherein R is as defined above;

- (ii) treating the said compound of formula III obtained in step (i) with a mineral acid to obtain a corresponding salt;
- (iii) treating the corresponding salt obtained at step (ii) with hydrogen peroxide to obtain thee said compound of formula I.

Compl. specn. 11 pages.

Drg. 1 sheet.

CLASS: 32-F3 (d).

155653

Int. Cl.: 7 07 c 43/20, 49/76.

A PROCESS FOR THE PREPARATION OF 3, 5-DIALKOXY ACETOPHENONE.

Applicant: RECKITT & COLMAN OF INDIA LIMITED OF 41, CHOWRINGHEE ROAD, CALCUTTA 700071, STATE OF WEST BENGAL, INDIA.

Inventors: 1. DR. SURENDRA PRASAD BHATNAGAR, 2. DR. BAJRANG BALI SINGH, 3. DR. CHOLLA-GHATTA GUNDU RAO, 4. DR. ARAKALI SREENIVA-SARAO RADHAKRISHNA.

Application No. 1235/Cal/82 filed October 20, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 11 Claims

Process for the preparation of 3, 5-dialkoxy acetophenone which comprises:

- (i) treating 3, 5-dihydroxy benzoic acid in dimethylformamide with alkyl halide in presence of socium bicarbonate, selectively hydrolysing the obtained alkyl 3, 5-dialkoxy benzoate by conventional method, followed by acidification by conventional method to obtain 3, 5-dialkoxy benzoic acid;
- (ii) treating the obtained 3, 5-dialkoxy benzoic acid of step (i) in aromatic hydrocarbon solvent with thionyl chloride in presence of catalytic amount of organic base to obtain 3, 5-dialkoxy benzoylchloride;
- (iii) condensing the obtained 3, 5-dialkoxy benzoylchloride in aromatic hydrocarbon solvent of step (ii) with aqueous suspension of alkali metal salt of alkyl acetoacetate at a temperature of -5 to 10°C to obtain the alkali metal salt of 3, 5-dialkoxy benzoyl alkyl acetoacetate; and finally
- (iv) hydrolysing the alkali metal salt of 3, 5-dialkoxy benzoyl alkyl acetoacetate of step (iii) by conventional method to obtain 3, 5-dialkoxy acetophenone.

Compl. specu. 13 pages.

Drg. 1 sheet.

CLASS 98-I

155654

Int. C1.: F24 I 3/00.

HEATING AND/OR COOKING DEVICE WITH A SOLAR COLLECTOR.

Applicant & Inventors: BERND STOY AND ERICH POHLMANN, OF AM SCHARFENSTEIN 6, 4030 RAIT-NGEN 8, WEST GERMANY; AND KADALOHBEINS-WEG 1, 8650 KULMBACH, WEST GERMANY.

Application No. 93/Cal/83 filed January 24, 1983.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Caloutta.

# 10 Claims

Heating-and/or cooking device with a solar collector for heat absorption a storage block for heat storage, at least the heat pipe connecting the solar collector to the storage block and a heating and/or cooking element in which case the heat pipe connecting the solar collector to the storage block slopes upwards at least during the heat-absorption and storage process, characterized in that either the heating and/or cooking element (5) is connected with the storage block (3) by way of the heat pipe (4) which also connects the solar collector (2) with the storage block (3) and for heating and/or cooking the heat pipe (4) from the storage block (3) to the heating-and/or cooking element (5) is inclined upwards, or else the heating-and/or cooking-element (5) is connected directly to the storage cooling element (5) is connected to the storage block (3) by way of an additional heat pipe (10) and the additional heat pipe (10) slopes upwards towards the heating and/or cooking element (5) for the purpose of heating and/or cooking.

Compl. specn. 15 pages.

Drg. 1 sheet. storage process, characterized in that either the heating and/

CLASS: 32F<sub>8</sub>c.

155655

Int. Cl.: C07c 31/02.

PROCESS FOR THE PRODUCTION OF A MIXTURE OF METHANOL AND HIGHER ALCOHOLS OF FUEL

Applicant: SNAMPROGETTI S.P.A. OF CORSO VENE-ZIA 16, MILAN, ITALY.

RAFFAFLE DI PIETRO, (2) ALBERTO Inventors: RAFFAFLE DI PIE PAGGINI & VINCENZO LAGANA.

Application No. 518/Cal/81 filed May 15, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 15 Claims

A process for the production of a "fuel grade" mixture of methanol and higher alcohols comprising

- (a) feeding to an alcohol synthesis reactor a mixture essentially constituted by CO and H2.
- (b) cooling the reaction mixture constituted by methanol higher alcohols, water and unreacted gases to a temperature ranging from 150°C to 250°C;
- (c) sending the cooled reaction mixture to a conversion reactor for converting CO & steam into CO<sub>2</sub> & H<sub>2</sub>;
- (d) cooling the latter reaction product constituted by methanol higher alcohols, unreacted gases, carbon dioxide and traces of water to a temperature enough to condensed the alcoholic mixture.
- (e) separating a liquid phase constituted by the alcoholic mixture of "fuel grade" and a geseous phase essentially constituted by CO, H<sub>2</sub> and CO<sub>2</sub>;
- (f) recycling the gaseous phase to the synthesis reactor after the removal of the CO2.

Compl. specn. 17 pages.

Drgs. 1 sheet.

CLASS: 77B<sub>2</sub>.

155656.

Int. Cl. C11b 1/04; 1/10.

EXTRACTION OF OIL FROM HIGH OIL BEARING SEED MATERIALS.

Applicant: CPC INTERNATIONAL INC., OF INTERNATIONAL PI AZA. ENGLEWOOD CLIFFS, NEW JERSEY 07632, U.S.A.

Inventors: ROBERT A. REINERS.

Application No. 1154/Cal/81 filed October 19, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 4 Claims

A total immersion process for the extraction of oil from high oil-bearing seeds without contaminating the miscella with fines, which comprises the steps of:

- (a) dispersing by method such as herein described fine-ly-divided high oil-bearing seeds containing from 10% to 25% water by weight, in a solvent for oil, such as hexane, to give a solid -solvent dispersion;
- (b) extracting by a method such as herein described oil from the solid -solvent discersion with additional
- (c) separating by a method such as herein described oil-containing solvent from insoluble material; and
- (d) recovering by a method such as herein described the oil from the oil- containing solvent.

Compl. specn, 20 pages.

Drgs. Nil.

CLASS: 32F2a.

155657

Int. Cl.: C07d 53/02.

PROCESS FOR THE PREPARATION OF 5-(AMINO-ALKYL) -11- PHENYL-5H-DIBENZO (b, e) (1, 6-DIAZE-

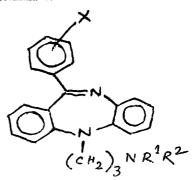
Applicant: A. H. ROBINS COMPANY, INC., OF 1407 CUMMINGS DRIVE, RICHMOND, VIRGINIA 23220, UNITED STATES OF AMERICA.

Inventors: CHANDLER ROY TAYLOR, JR.

Application No. 1260/Cal/81 filed November 13, 1981.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

A process for the preparation of a compound of the formula shown in formula 1.



wherein; X is selected from the group consisting of hydrogen, chlorine bromine or fluorine,

R<sup>1</sup> and R<sup>2</sup> are both hydrogen or R<sup>1</sup> is hydrogen when R' is methyl and the pharmaceutically acceptable acid addition salts thereof, comprising the steps of

Step (1) reductively alkylating as herein described o-nitro-diphenyl-amine with a solution of 3-(1-phthalimido) 1-chlo-ropropane to give a N-3[1-phthalimido) propyl-O-nitrodiph-enylamine compound having the formula shown in formula

Step (2) reducing the compound prepared in step 1 to give an N-[3-(lphthalimido) propyl] -o-aminodiphenylamine having the formula shown in Formula VIII.

Step (3) reacting the compound prepared in step 2 with a benzoyl chloride of the formula shown in formula IX

to give an N-[3-(phthalimido) propyl] -o-benzamidodiphenylamine of the formula shown in Formula IIb.

Step (4) cyclodehydrating as herein described the compound prepared in step 3 to give a 5-(3-phthalimidopropyl)-11-phenyl-5H-dibenzo [b, e,] [1, 4] diazepine of the formula shown in formula III.

Step (5) Reacting the compound prepared in step 4 with hydrazine and an acid to give a 5-(3-aminopropyl)-1-phenyl-5H-dibenzo [b, e] [1, 4] diazepine of the formula shown in Formula 1 wherein R¹ and R² are both hydrogen, and

Step (6) optionally reacting the compound prepared in step 5 with

- (a) triethylorthoformate
- (b) NaBH

to give an N-methyl-11-phenyl-5H-dibenzo [b, e] [1, 4] diaze-pine-5- propanamine of the formula shown in Formula 1 wherein R<sup>1</sup> is hydrogen and R<sup>2</sup> is methyl.

Compl. specn. 21 pages.

Drgs. 2 sheets.

CLASS: 85J & K.

155658

Int, Cl. F23b 7/00; F23c 11/00.

CATALYTIC COMBUSTION SYSTEM FOR STATIONARY GAS TURBINE".

Applicant: WESTINGHOUSI ELECTRIC CORPORATION, OF WESTINGHOUSI BUILDING, GATEWAY, CENTER, PITTSBURGH, PENNSYLVANIA 15222, UNITED STATES OF AMERICA.

Inventors : PAUL WALTER PILLSBURY & SERAFINO MARIO DECORSO.

Application No. 176/Cal/82 filed February 15, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 4 Claims

A catalytic combustion system for a stationary gas turbine comprising a combustor basket having a tubular sidewall defining therein a primary combustion zone, primary nozzle means for supplying fuel for combustion in the primary zone, and a secondary zone downstream from the primary combustion zone, secondary means for injecting secondary fuel and air into the secondary zone for mixing with the primary combustion product flow to provide a fuel-air mixture at a combustor basket outlet sufficiently mixed and heated to undergo catalytic reaction a catalytic unit means for supporting said catalytic unit to receive the outlet flow from said primary nozzle means and said secondary fuel is supplied to charter the intrins when conditions for catalytic reaction are achieved and so that primary fuel is supplied to energize the turbine when no secondary fuel is being supplied and to energize the turbine and preheat the secondary fuel-air mix as needed when secondary fuel is being supplied.

Compl. specn. 17 pages.

Drgs. 4 sheets.

CLASS: 85J & K.

155659

Int. Cl. F23b 7/00, F23c 11/00.

IMPROVED CATALYTIC COMBUSTION SYSTEM FOR A STATIONARY COMBUSTION TURBINE HAVING A TRANSITION DUCT MOUNTED CATALYTIC ELL-MENT.

Applicant: WESTINGHOUSE ELLCTRIC CORPORATION, OF WESTINGHOUSE BUILDING, GATEWAY CENTER, PITTSBURGH, PENNSYLVANIA 15222, U.S.A.

Inventors: PAUL EDWARD SHEIHING AND JAMES ANTHONY LAURELLI.

Application 177/Cal/82 filed February 15, 1982.

Appropriate office for opposition proceeding, (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

# 9 Claims

A catalytic cobustion system for a stationary combustion turbine having a casing comprising a supported combustor basket having means for burning primary fuel to provide a preheated gas means for mixing secondary fuel and air with the preheated gas, a transition duct disposed downstream from said combustor basket means for supporting said duct relative to the turbine casing a catalytic unit means for supporting said catalytic unit relative to an upstream portion of said

transition duct to put the thrust load from said catalytic element on said duct supporting means and means for coupling an outlet portion of said combustor basket to an inlet of said catalytic unit.

Compl. specn. 13 pages.

Drgs. 7 sheets.

CLASS: 40-B, & 55F.

155660

Int. Cl.: C07g 7/028.

A PROCESS FOR THE PREPARATION OF A DEBRANCHING ENZYME PRODUCT.

Applicant: NOVO INDUSTRI A/S, OF NOVO ALLE, DK-2880, BAGSVAERD, DENMARK.

Inventors: GRETHE CAMILLA NIELSEN, (2) IVAN VERNER DIERS, (3) HELLE OUTTRUP, AND BARRIE EDMUND NORMAN.

Application No. 434/Cal/82 filed April 20, 1982.

Appropriate office for opposition proceedings (Rule 4, Patents Rules, 1972) Patent Office, Calcutta.

## 7 Claims

A process for the preparation of a debranching enzyme product comprising a debranching enzyme of the pullulanase type obtainable by cultivation of a strain of the Bacillus genus, which process is characterized by the operational steps of cultivating a strain of the tazonomic group Bacillus acidopullulyticus under aerobic conditions in a fermentation medium containing assimilable sources of carbon and nitrogen and a basal salt composition, the fermentation taking place at or above room temperature, then freeing the fermentation broth from bacterial cells and other debris, concentrating and, if desired, dewatering the concentrate said concentrate containing a debranching enzyme with the following additional characteristics:

- (a) it exhibits enzyme chemical Properties essentially identical to and immunological properties identical or partially identical to those of the debranching enzyme derived from the Bacillus strain NCIB 11067,
- (b) its activity optimum, measured by incubation for 30 minutes in acetate buffer (0.05M) at PH 4-5 is at least about 60°C,
- (c) its PH optimum is in the range of 3.5 to 5.5 as determined by incubation for 30 minutes in acetate buffer (0.05M) at about 60°C, and
- (d) it has a residual activity after 72 hours at 60°C as measured in a dextrose solution (35 percent D.S. by weight) at pH 5 at least 50 percent.

Compl. specn. 38 pages.

Drgs. 1 sheet.

# OPPOSITION PROCEEDINGS

(1)

The opposition entered by the Director General Research, Designs & Standards Or, anisation to the grant of a patent on application No. 152851 made by True Temper Railway Appliances, Inc., as notifed in the Gazet'e of India, Part-III, Section 2 dated the 24th November, 1984 has been dismissed and a patent has been ordered to be sealed on this application.

(2)

The opposition entered by Orissa cement Limited to the grant of a patent on application No. 153002 made by the Director General, Cement Research Institute of India as notified in the Gazette of India, Part-III, Section 2 dated the 12th January, 1985 has been dismissed and ordered that a patent to be scaled.

# PRINTED SPECIFICATION PUBLISHED

A limited number of printed copies of the undernoted specifications are available for sale from the Officer-In-Charge, Government of India, Central Book Depot, 8, Hastings Street, Calcutta, at two rupees per copy:—

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144338 144344 144351 144353 144355 144357 144360 144364 144366 144368 144369 144375 144377 144383 144384 144385

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144789 144800 144802 144803

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145103 145106 145114 145115 145117 145118 145119 145121

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145340 145351 145355 145371 145382 145390

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145541 145545 145547

(15)

145562 145566 145573 145578

(16)

145583 145592 145594 145600 145603 145607 145608 145616 (17)

145619 145620 145629 145639 145645 **145648 145651 145653** (18)

145791 145792 145793 145795

(19)

145808

# PATENTS SEALED

 150732
 151009
 152016
 152042
 152190
 152478
 152776
 152783

 152784
 152786
 152787
 152796
 152797
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 145663
 145664
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 152815
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 152881
 152931
 153113

# AMENDMENT PROCEEDINGS UNDER SECTION 57

Notice is hereby given that Charbonnages De France, a French Company, of 9 Avenue Percier, 75008 Paris (Seine), France have made an application under Section 57 of the Patents Act, 1970 for amendment of specification of their Patent application No. 153919 for "An installation for drying and/or heating a combustible granular or pulverulent material". The amendments are by way of disclaimer or explanation. The application for amendment and the proposed amendments can be inspected free of charge at the Patent Office, 214 Acharya Jagadish Bose Road, Calcutta-700 017, or copies of the same can be had on payment of the usual copying charges. Any person interested in opposing the application for amendment may file a notice of opposition on the prescribed Form 30 within three months from the date of this notification, at the Patent Office, Calcutta. If the written statement of opposition is not filed with the notice

of opposition it shall left within one month from the date of filing the said notice.

# RENEWAL FEES PAID

# REGISTRATION OF DESIGNS

The following designs have been registered. They are not open to inspection for a period of two years from the date of registration except as provided for in Section 50 of the Designs Act, 1911.

The date shown in the each entry is the date of registration of the design included in the entry.

- Class 1. No. 154669. Emco Electricals Pvt. Ltd., an Indian Company, of 106 Industrial Area, Sion, Bombay-400 022, Maharashtra, India. "an Electromagnetic Brake". 7th August, 1984.
- Class 1. No. 154628. Larsen & Toubro Limited, of L & T House, Ballard Estate, Bombay 400 038, Maharashtra. India, an Indian Company. "an Arc Chamber of a Contactor". 25th July, 1984.
- Class 1. No. 155084. Eagle Flask Private Limited, under the Indian Companies Act, at Eagle Estate. Talegaon 410 507, District Pune, State of Maharashtra, India. "Container". 23rd November, 1984.

- Class 1. No. 155064. Wimeo Pen Company, 11, Mehta Industrial Estate, 1st floor, I.B. Patel Road, Goregaon (East), Bombay-400 063, Maharashtra State, an Indian Partnership Firm. "Ball Pen" 16th November, 1984.
- Class 3. No. 155095. P/f Marinplast, FR-3815 Kaldbak, Faroe Islands, (via) Denmark, a mpany duly organised and existing under the laws of Denmark, "boats". 24th November, 1984.
- Class 3. No. 154695. Roplas (India) Limited, an Indian Company of 145, Bombay-Poona Road, Pimpri, Poona-411018, Maharashtra, India. "A VEHI-CLE<sup>2</sup>. 14th August, 1984.
- Class 3. No. 154513. Sudhir Raghubir, 704 Mayfair Gardens, 4, Mayfair Road, Calcutta-700 019 West Bengal, India and Ashok Sunda, 57C Beltalla Road, Calcutta-700 025, West Bengal, India. "Vibrators' for Physical therapy". 16th June, 1984.
- Class 3. No. 154662. Rotpunkt Dr. Anso Zimmermann, of 6434 Niederaula, West Germany. "an Insulating Jug". Reciprocity date is 29th June, 1984. (U.K.).
- Class 3. No. 155086. Himanshu Vaidya and Avinash Diwan, Both Indian Nationals, of 411, A.G.H. Chambers, 379/381, Narsi Naths Street, Bombay 400 009, State of Maharashtra, India." "Container Cap". 23rd November, 1984.
- Class 3. No. 154719. Asian Advertisers, 20, Kala Bhavan, 3, Mathew Road, Opera House, Bombay 400 004, Maharashtra, An Indian Partnership Firm. "Fruit Tray". 20th August, 1984.
- Class 3. No. 154722. Asian Advertisers, 20, Kala Bhavan, 3, Mathew Road, Opera House, Bombay 400 004, Maharashtra, An Indian Partnership Firm. "Vertical Wall Calendar". 20th August, 1984.
- Class 3. No. 154762. Soliashams International, 4/P, Laxmi Industrial Estate, New Link Road Extension, Off Veera Desai Road, Andheri (West), Bombay-400 058, Maharashtra, an Indian Sole Proprietary Firm. "Cassette Container". 31st August, 1984.
- Class 5. No. 154954. Silver Spark Private Limited, A Company incorporated under the Indian Companies Act C-66-Anand Niketan, New Delhi-110021, India. An Indian Company. "Cockroach Trap". 15th October, 1984.

NAME INDEX OF APPLICANTS FOR PATENTS FOR THE MONTH OF AUGUST 1984 (NOS. 543|CAL|84 TO 606/Cal/84, 212|Bom|84 to 242|Bom|84, 560|Mas|84 to 668|MAS|84 AND 622|DEL|84 TO 688|DEL|84)

Name and Appln. No.

# --A--

AE PLC.-572/Mas/84.

A. H. Robins, Company, Inc.—608/Mas/84 & 609/84. AMC International Alfa Metalcraft Corporation AG.—626/Mas/84.

Arc Technologies Systems Ltd. 543/Cal/84.

Agrawal, A.-675/Del/84.

Ahmedabad Textile Industries Research Association.—222/Bom/84.

Alliance Technique Industrielle.— 546/Cal/84. Aluminium Pechiney.—559/Cal/84.

Alustuisse Italia S.p.A.—587/Mas/84 & 589/Mas/84. American Can Company.--585/Cal/84 & 605/Cal/84.

Name and Appln. No.

American Home Products Corporation -599/Cal/84.

Amin, N.-231/Bom/84.

Anderson Stratholyde PLC .-- 661/Del/84 & 673/Del/84.

Anicon, Inc.-582/Mas, 84.

Asup Private Limited.—658/Dc1/84.

Ayyathurai, R.C.S.C.P.C.-573/Mas/84.

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BASF Aktiengesellschaft.—570/Mas/84.

BBC Brown. Boveri & Co Ltd -611/Mas/84.

BOC Group plc., The.—567/Mas/84.

BP Chemicals Limited. -624 'Del/84.

Babcock & Wilcox Company, The .-- 568/ Cal/84 & 572/Cal/ 84.

Balaji K, S .- 649/Mas/84.

Basic, J. N.-640/Mas/84.

Bayer Aktiengesellschaft.-688 'Mas/84.

Beacon Industrial Electronics Private Limited—220/Bom/84.

Beloit Corporation. -- 561/Cal/84

Bhandari, N.M.—236/Born/84.

Bharat Heavy Electricals Lunited. -626/Del/84, 627/Del/84. 647/Del/84, 648/Del/84 & 649/Del/84.

Biogen N. V.-562/Cal/84.

Biswas, P. K.-606/Cal/84.

British Gas Corporation.—641/Mas/84 & 642/Mas/84.

Bronstein, A.I.-571/Cal/84.

CPC International Inc.—653/Mas/84.

Canteenwalla, J. S -223/Bom/84.

Cape Insulation Limited. - 600/Cal. 84.

Cavalent Technology Corporation.—544 Cal/84.

Centre Stephanois De Recherches Macniques Hydromecanique Et Frottement -- 663/Del/84.

Chandran, M.—623/Del/84. Chawla, S. K.—639/Del/84 & 640/Del/84.

Codd, E. T.—578/Cal/84.

Combustion Engineering, Inc. -551/Cal/84.

Condon, C. J.—571/Mas/84.

Continental Gummi-Worke Aktiongesellschaft -- 652/Mas/84 & 663/Mas/84.

Works.—588/Mas/84, 619/Mas/84 Corning Glass 629/Mas/84.

Council of Scientific and Industrial Research. -622/Del/84 633/Del/84, 634/Del/84, 635/Del/84, 650/Del/84 & 651] Del 84.

Coll-Reynolds Engineering Co., Inc.—230/Bom/84.

Czernaik, M.K.E. -602/Mas/84.

DLF Universal Limited .- - 659/Del/84.

Davidson & Co Ltd.--565/Mas/84.

Dholaria, K. R. -239/Bom/84.

Didier Egnineering GmbH.--563/Cal/84.

Director, All India Institute of Medical Science. The .-- 636/ Del/84 & 638/Del/84.

Director, Thapar Institute of Engineering & Technology.—677/Del/84 & 678/Del/84.

Duraplug Electricals Limited.—682/Del/84.

# --E--

ELI Cohen. -635/Mas/84.

Emco General Plastic Industries Private Limited. - 596 Cal/

Emhart Industries. Inc.--654/Del/84 & 679/Del/84.

Name and Apple. No.

Energy Conversion Devices Inc.-550/Cal/84.

Engelhard Corporation.-558/Cal/84.

Enichem Elastomeri S.p.A.-616/Mas/84.

Exxon Research and Engineering Company. -681/Del/84.

# -F-

F. L. Smidth & Co -- 601/Mas/84.

Fabrique De Fer De Maubeuge. -- 645/Del/84.

Firma Carl Still GMBH Co. KG.-664/Mas/84.

First Sunpower Privite I imited.—644/Mas/84.

Foster Whee'er Energy Limited.—672/Del/84.

Fried Krupp Gesellschaft Mit Beschrankter Haftung.—547/ Ca/84.

# - G--

Garfield, N H. Gte Valeron Corporation. -590/Mas/84 & 583/Cal/84.

Garg, R. P.-677/Del/84 & 678/Del/84.

Gea Luftkuhlergesellschaft Happel GMBH & Co - 576/Cal/

Gebelius, S R.V.- 674/Del/84

General Electric Co of India Ltd.—The. -674/Del/84 & 560/Cal/84.

George, P. V.-647/Mas/84 & 648/Mas/84.

Ghadiali, C.--218/Bom/84.

Gilbertson, T A -580/Cal/84.

Gillette Company, The. -- 686 'Del /84.

Gist-Brocades N. V.-669/Del/84.

Glass Incorporated International,-600/Cal/84.

Glaverbel & Verlipack -- 655/Del/84.

Gopalakrishnan, S P--585/Mas/84.

Graf & Cie 1. G -615/Mas/84 & 666/Mas/84

Greene & Kellogg, Inc -- 584/Cal/84.

# -H--

Haliharan, P. V. -573/Mas/84

Hoechst India Limited.—238/Bom/84.

Honda Kiken Kogyo Kabushiki Kaisha.-631/Del/84.

# --- T ---

JTT Corporation -610/Mas/84

Imperial Chemical Industries PLC.—625/Del/84 & 656/Del/

Indian Institute of Science.—566/Mas/84.

Indian Institute of Technology. - 596/Mas/84.

Indian Petrochemical Corporation Ltd.—232/Bom/84.

Ingersoli-Rand Company .-- 646/Del/84

Institut Français Du Petrole.-627/Mas/84.

Institut Khimii I Tekhnologii Redkikh.-581/Cal/84.

Elementov I Mineral-nogo Slrya Kalshoga Filiala Akademii Nauk SSSR.-582/Cal/84.

Institut Teplo-I Massoobmena Imeri A. V. Lykova Akademii Nauk Belorusskoi Sr.—552/Cal/84, 553/Cal/84 & 668/ Del/84.

# -J-

Jawa.—588/Cal/84.

Jov Engineering Works Ltd., The.-684/Del/84

# -K-

Kanegafuchi Kagaku Kogyo Kabushiki Kaisha.-658/Mas/84. Kenney, G. B -598/Mas/84,

Kerr-Mogee Chemical Corporation.—579/Mas/84 & 580/ Mas /84.

K Fuel/Koppelman Patent Licensing Trust.-565/Cal/84,

Name and Appln. No.

Khosla Engineers. -637/Del/84.

Kimberly-Clark Corporation.—581/Mas/84 & 583/Mas/84. Krauss-Maffei Aktiengesellschaft. -579/Cal/84.

-L-

Lapsker, I.—604/ Mas/84.

Linde Aktiengesellschaft.-667/Mas/84.

Lipha, Lyonnaise Industrielle Pharmaceutique, -- 629/Del84.

Lonza Limited. -- 563/Mas/84.

Lonsinger AG.-662/Del/84.

Lummus Crest Inc. -587/Mas/84, 589/Mas/84 & 642/Del/

--M---

Macneill & Magor Ltd.--556/Cal/84.

Mahajan, S. K.-227/Bom/84.

Mallya, M. S.—645/Mas/84.

Marathe, R. B.-234/Bom/84.

Maschinenfabrik Rieter AG .-- 592/Mas/84 & 622/Mas/84.

Mesherry, T. W .-- 590 / Mas / 84.

Mechanical Technology, Inc. 680/Del/84.

Metal Box p.l.c.-620/Mas/84.

Mistri, S. B.-235/Bom/84.

Mitsubishi Denki Kabushiki Kaisha.-634/Mas/84.

Mitsui Toatsu Chemicals Inc .- 628/Del/84.

Mittal, A. K.-652/Del/84.

Mobil Oil Corporation.--607/Mas/84, 630/Mas/84, 631/Mas/ 84, 631/Mas/84, 632/Mas/84 & 633/Mas/84. Mohindra, R.—613/Mas/84.

Monsanto Company. - 597/Mas/84, 599/Mas/84 & 600/Mas/

Murthy, K. N.-665/Mas/84.

-N--

Nadkarni, H. P.-219/Bom/84.

Nagarajan, S. N.-621/Mas/84.

Nair, K. V. R.-224/Bom/84.

Natarajan, G. V.-584/Mas/84.

National Organic Chemical Industries Limited. - 229 /Bom /84.

Naturewatch Limited .- 614/Mas/84.

Nayak, U. V.-650/Mas/84.

Nitto Chemical Industry Co. Ld.-625/Mas/84.

Norsk Hydro a.s.-665/Del/84

Nuclear Technology Corporation .- 628/Mas/84.

Nukem GmbH.-557/Cal/84.

Oil & Natural Gas Commission of Keshava Deva Malaviya Institute of Petroleum Exploration.—683/Del/84.

Oriental Appliances (P) Limited -561/Mas/84 & 562/Mas/ 84.

Otdelenie Vsesojuznogo Nauchno-Issledovatelskogo Instituta Elektrotermicheskogo Oberudovania V. Gorode Kharkove. -552/Cal/84, 553/Cal/84 & 668/Del/84.

\_\_P\_\_

Palaniswamy, S. N.-560/Cal/84. Palanivelu, S.-586/Mas/84.

Pall Corporation.-570/Cal/84 & 595/Cal/84.

Panchaksharaiah, T. M.-564/Mas/84.

Pannalal, N.-215/Bom/84.

Paramount Sinters Private Limited .-- 217/Bom/84.

Pfizer Inc.-653/Del/84.

Pillaiyar, P.-560/Mas/84.

Polymer Tectonics Limited. -632/Del/84.

Name and Appln. No.

Post Office, The. -- 593 / Mas/84.

Projects & Development India Ltd.--577/Cal/74.

Purohit, S. S.-212/Bom/84

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Rao, M. S.—617/Mas/84. Rao, Y. M.—591/Mas/84.

Ray, P.-214/Bom/84.

Registrar, University of Calcutta, The .- 589/Cal/84.

Ribi Immunochem Research, Inc. 567/Cal/84.

Richter Gedeon Vegyeszeti Gyar R. T .-- 597/Cal/84 & 598/ Cal/84.

Rilett, J. W.-667/Del/84.

Rohm BmbH.-660/De1/84.

Roy, S .-- 555/Cal/84.

Ruhregas Aktiengeseilschaft.-636/Mas/84.

--S--

SKF Nova.—687/Del/34.

SKF Steel Engineering Aktiebolag.—594/Mas/84.

Saint-Gobain Vitrage. -- 545/Cal/84.

Santrade Limited .-- 221/Bom/84.

Satake Engineering Co. Ltd.-554/Cal/84.

Sathaya, V. G .- 226/Bom/84.

Schlumberger Limited.-639/Mas/84.

Seshadri, K .- 649/Mas/84.

Shah, Z.-225/Bom/84.

Shaw Industries Ltd.-638/Mas/84.

Shell Internationals Research Mastschappij B. V.-654/Mas/ 84.

Sheth, N.—213/Bom/84.

Shri Ram Institute for Industrial Research.—643/Del/84, 644/Del/84 & 657/Del/84.

Silvatrim S. A. M.-671/Del/84.

Singh, B.-641/Del/84.

Societe Anonyme De Recherche Et D'etudes Techniques .-594/Cal/84.

Societe des Produits Nestle S. A .-- 618/Mas/84.

Solvey & Cie. -685/Del/84.

Southern Petrochemical Industries Corporation Ltd.-574/ Mas/84, 575/Mas/84, 576/Mas/84 & 577/Mas/84.

Sridhara, B. N.-646/Mas/84.

Stamicarbon B. V.-655/Mas/84 & 668/Mas/84.

Stanley, I .- 637/Mas/84.

Stauffer Chemical Company.—605/Mas/84. 624/Mas/84 651/Mas/84 & 662/Mas/84.

Stork Brabant B. V.-395/Mas/84.

Suessan Textile Bearing Limited.—228/Bom/84.

Sulzer-Ruti Machinery Works Ltd.-591/Cal/84.

Syntex Pharmaceuticals International Limited .- 568/Mas/84 & 569/Mas/84.

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Tata Iron & Steel C. Ltd.--573/Cal/84 & 574/Cal/84.

Thankalyyan, S. (Dr.) -603/Mas/84.

Tole, A. P.—216/Bom/84.

Toyama Chemical Co. Ltd.-601/Cal/84, 602/Cal/84 & 603/ Cal/84.

Toyo Engineering Corporation .-- 569/Cal/84 & 628/Del/84. Trutzshler GmbH & Co. KG.-604/Cal/84.

Tube Investments of India Limited.—659/Mas/84 & 660/ Mas/84.

Name and Appln. No.

\_U\_

Uop Inc.-670/Del/84.

UNIK Van Kunsthesttabrieken B. V.—656/Mas/84 & 657/Mas/84.

Union Carbdie Corporation.—623/Mas/84 & 661 Mas/84. Unisystems Private Limited.—676/Del/84.

Upadhyaya, G.-237/Bom/84.

---V--

Vaal Reefs Exploration & Mining Company Limited.—612/Mas/84.

Vallourec.-549/Cal/84.

Veb Kombinat Polygraph "Werner Lamberz" Leipziig.—586/Cal/84 & 587/Cal/84.

Venkitachiam, V. -233/Bom/84.

Verlipach.—655/Del/84.

Vickers, Incorporated.—592/Cal/84.

Voest-Alpine Aktiengesellschaft.—566/Cal/84 & 680/Del/84.

Name and Appln. No.

Vsesojuzny Nauchno-Issledovatelsky I Proektny Institut Aljuminievoi, Magnievoi I Elektrodnoi Promyshlennosti.— 548/Cal/84, 575/Cal/84 & 593/Cal/84,

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W. Schlafhorst & Co.—240/Bom/84, 241/Bom/84 & 242/Bom/84.

Wang, Y. H.—599/Cal/84.

Westinghouse Brake And Signal Company Ltd.—666/Del/84. Wilhelm Hern. Muller & Co.—663/Mas/84.

Wurz, D. (Professor Dr. Ing.).—564/Cal/84.

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Yogendra, H. S.—643/Mas/84.

R. A. ACHARYA, Controller General of Patents, Designs and Trade Marks.